REPORT

OF

THE HIGH LEVEL COMMITTEE

TO

REVIEW

THE EDUCATIONAL STATISTICS SYSTEM IN INDIA



Planning, Monitoring and Statistics Division
(Department of Education)
Ministry of Education and Culture
Government of India
New Delhi.

ACKNOWLEDGEMENT

The Committee expresses its gratitude to Smt. Sheila Kaul, Minister of State for Education and Shri S. B. Chavan, former Education Minister for their interest in our work. We convey our thanks to the Education Secretary Smt. Anna Malhotra for the interest and support extended to the Committee.

The Committee's assignment required extensive coverage of material and considerable deliberations. Thanks to the active participation by the Members who were deeply committed to the task and who made it convenient to attend the several meetings despite their own busy schedule, it has been possible to complete the work within a reasonable period. A team of Members comprising Prof. P. K. Bose, Shri J. Veeraraghavan and Dr. A. B. L. Srivastava also assisted in the finalisation of the report. The Committee was further assisted by many officials of the different Departments and other special invitees who made significant contributions. The Committee would like to thank all of them for their kind cooperation.

The Committee would like to convey its special thanks to the State Governments who deputed their representatives and also those who extended hospitality and assistance during our visits.

The Committee would also like to thank Miss P. S. Sakuntala, Deputy Secretary, incharge of the Planning Division and Shri G. C. Kwatra, Research Officer for their whole-hearted assistance at all stages of the Committee's

work in particular in drafting the report. The Committee would like to place on record its appreciation of the secretarial assistance rendered by Shri S. S. Malkani, Senior Investigator and B. K. Jain, Statistical Assistant.

New Delhi; September 24, 1982 S. RAMAMOORTHI, Chairman



CONTENTS

CHAPTERS

| No. | Page No. |
|---------------------------------------------------------------------------------|----------|
| I. Introduction | ı-5 |
| II. System of Educational Statistics in India | 620 |
| III. Educational Statistics for Planning and Management | 21-29 |
| IV. Organisation and Management | 30-38 |
| V. Procedure for Data Collection | 39-54 |
| VI. Training | 55—61 |
| VII. Computerization and Dissemination of Information | 6267 |
| VIII. General | 68—69 |
| IX. Summary of Recommendations | 70-74 |
| X. Conclusion and Recommendations | 75—86 |
| ANNEXURES | |
| I. Gazette Notification regarding the Consti- tution of High Level Committee | 8790 |
| II. Terms and Reference and the Composition of the Working Group 'A' & 'B' | 91-93 |
| (iii) | |

| PAGE No. |
|--------------|
| 94 |
| 95—96 |
| 97 |
| 98102 |
| 103-104 |
| . 105-106 |
| J 111 |
| |

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ABBREVIATIONS USED

| B.E.O. | Block Education Office/Officers |
|--------------|-----------------------------------------------------|
| C.S.O. | Central Statistical Organisation |
| D.A.E. | Directorate of Ault Education |
| D.E.O. | District Education Office/Officers |
| D.S.T. | Department of Science & Technology |
| E.S. Forms | Educational Statistics Forms |
| G.O.I. | Government of India |
| I.A.M.R. | Institute of Applied Manpower Research |
| I.S.1. | Indian Statistical Institute, Calcutta |
| I.S.C.E.D. | International Standard Classification of Educa- |
| | tion |
| M.I.S. | Management Information System |
| N.C.E.R.T. | National Council of Educational Research & Training |
| N.I.C. | National Informatic Centre |
| N.I.E.P.A. | National Institute of Educational Planning & |
| | Administration |
| N.S.S.O. | National Sample Survey Organisation |
| P.M. | Primary Middle |
| P.M.S. | Primary Middle Secondary |
| P.M.S.D. | Planning, Monitoring & Statistics Division |
| S.C. | Scheduled Castes |
| S.C.E.R.T. | State Council of Educational Research & |
| | Training |
| S.I.E. | State Institute of Education |
| S.I.S.U. | Students Information Service Unit |
| S.T. | Scheduled Tribes |
| U.G.C. | University Grants Commission |
| U.N.E.S.C.O. | United Nations Educational Scientific & Cul- |

tural Organisation

CHAPTER — I

INTRODUCTION

- 1.1 In pursuance of the recommendations made by the Eighth All India Conference on Educational Statistics held in Udaipur in September, 1980 which were accepted by the Standing Committee on Educational Statistics at its seventh meeting held on 30-12-80, a High Level Committee was constituted in 1981 vide Ministry of Education's Gazette Notification No. F. 10-1|81-Stat. dated the 20th February, 1981 for reviewing the entire educational statistical system in the country. The terms of reference of the Committee were:—
 - (i) To prepare a perspective plan for the improvement of the educational statistics and their utilisation in policy making, planning and administration at all levels.
 - (ii) To propose the methodology for collecting data on various items and to spell out the role of different agencies involved in data collection so that duplication of efforts is avoided and the relevant data are made available with minimum of resource.
 - (iii) To suggest the type of schedules to be used for data collection from primary sources and the records to be maintained at different levels so as to help in efficient collection of information.
 - (iv) To propose measures for improving the quality and timely presentation of data.

- (v) To suggest the changes in the infrastructure at the Central and State levels and the norms for staff, etc., in order to bring about the above improvements.
- (vi) To suggest training and orientation programmes at all levels for ensuring proper collection and use of data.
- (vii) To suggest short-term measures for improving the existing system on the basis of the discussions held with the high officials by personal visits of members of the Committee to some of the States.
- 1.2 The composition of the Committee was as under:

CHAIRMAN

Shri S. Ramamoorthi, Joint Secretary, Ministry of Education and Culture, Government of India, New Delhi.

MEMBERS

- Prof. P. K. Bose, formerly Pro-Vice Chancellor for Academic Affairs, Calcutta University, Calcutta.
- Dr. M. B. Buch (Retd.), Ex Head, Department of Education, M.S. University of Baroda, Baroda.
- Dr. K. C. Seal, Director-General, Central Statistical Organisation and Ex-Officio Addl. Secretary, Deptt. of Statistics, New Delhi.
- Dr. S. N. Saraf,* Adviser (Education), Planning Commission, New Delhi.
- *Now left the concerned organisation since retirement.
- *Shri M. C. Dubey, Deputy Advisor (Education)
 Planning Commission participated in the meeting.

- Shri J. Veeraraghavan, Executive Director, National Institute of Educational Planning & Administration, New Delhi.
- Dr. A. B. L. Srivastava, Prof. & Head, Survey and Data Processing Unit, National Council of Educational Research & Training, New Delhi.
- Shri R. K. Chhabra, Secretary, University Grants Commission, New Delhi.
- Shri S. N. Mehrotra, Vice-Chancellor, Agra University, Agra.
- Shri K. D. Bhatia, Director, Bureau of Economics & Statistics, Delhi Administration, Delhi.
- *Shri N. D. Qureshi, Shri S. A. Laharwal, Education Secretary, Government of Jammu & Kashmir.
- *Shri G. K. Arora, Shri R. C. Tripathi, Education Secretary, Government of Uttar Pradesh.
- Shri P. K. Umashankar, Commissioner and Special Secretary, Education Department, Government of Kerala.
- *Since transferred from the Education Department.

MEMBER SECRETARY

- Shri S. C. Seddey, Deputy Director, (Stat.), Ministry of Education & Culture, Government of India, New Delhi.
- 1.3 In its first meeting, the High Level Committee opted for the Working Group methodology to consider in depth the several issues of educational statistics. Two separate

Working Groups (A) and (B) were set up one to deal with all aspects at the pre-collection stage and other with the post-collection issues such as problems of organisation, machinery, training, computerisation, etc. The Committee drew up the terms of reference of the two Working Groups as given at Annexure-III. The Committee also decided to associate more representatives from various other user organisations and State Departments in these deliberations and made suitable nominations to the Working Groups accordingly.

- 1.4 The Committee also decided to depute teams of its members to visit a few States for studying their planning, monitoring and statistical system with a view to identifying the good features as well as deficiencies obtaining in the system of collection of educational statistics. A detailed questionnaire was prepared for the Accordingly, the Ministry deputed teams of members High Level Committee to visit the States of Karnataka, West Bengal, Jammu and Kashmir and Uttar Pradesh. Visits to these States were found to be quite useful in giving the members a good idea about the field conditions and helped in formulating suitable recommendations improving the existing system of collection of educational statistics at State level and lower levels viz. District and Block level. The Committee visited the Statistical Unit of the Planning and Statistical Division of the Ministry and also the Directorate of Adult Education.
- 1.5 The Committee also decided to circulate a questionnaire to the important user organisations of educational data viz. Planning Commission. National Council of Educational Research and Training (N.C.E.R.T..), University Grants Commission (U.G.C.), National Institute of Educational Planning and Administration (NIEPA), Ins

titute of Applied Manpower Research (IAMR), Department of Science and Technology (DST) and the various divisions of the Ministry with a view to identifying the existing major data gaps keeping in view their needs. A copy of the questionnaire is given at Annexure IV.



CHAPTER II

SYSTEM OF EDUCATIONAL STATISTICS IN INDIA Constitutional Provisions

- 2.1. Education including Technical Education, Medical Education and Universities figure in the concurrent list of the Indian Constitution. Besides, the Central Government is also vested with direct responsibilities in a few specific areas e.g. co-ordination and determination of standards in institutions for higher education and research and scientific and technical institutions, union agencies and institutions for professional, vocational or technical training and the promotion of special studies or research and the administration, and maintenance of Central Universities and any other educational institutions including those for scientific or technical education declared by an Act of Parliament to be an institution of national importance. Planning including educational planning is also in the concurrent list.
- 2.2. Besides, the Constitution provides for two onerous responsibilities on the State viz. provision of universalisation of elementary education and promotion of educational and economic development of the weaker sections of the society.

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Structure of Education

2:3. Based on a comprehensive review of the educational system in all its aspects, undertaken by the Kothari Commission (1964—66), the National Policy on Education was adopted in 1968. Therein, a uniform structure of education

has been recommended generally known as 10+2+3 system, consisting of 10 years of general education at the school stage, followed by 2 years of higher secondary education and 3 years of university education to the first degree. Within this broad pattern, which is yet to be introduced in a few States, there is considerable variation amongst States in respect of the grades which constitute the different levels of education. For example, primary stage consisting of grades of I-IV and middle stage consisting of V-VII is obtained in some States, whereas primary stage consisting of grades I-V and middle stage of grades VI-VIII is operative elsewhere. Similarly, the age of entry also varies from State to State but in majority of them it is 64. For purpose of reporting statistics on enrolments at the national level, the following structure is used:-

primary level—grades I—V.
middle level—grades VI—VIII.
secondary education—grades IX—X.
higher secondary education—grades XI-XII.
university education—grades XIII onwards.

2.4. Non-formal education programmes for children in the age-group 9—14 has been recently introduced in a big way. States are opening more and more centres of non-formal education for the children who are not able to attend the formal schools. In higher education, similar opportunities are extended through Correspondence Courses leading to recognised degree/diplomas, to those who are not in a position to attend regular colleges.

Educational Planning.

2.5. (a) The implementation of the policy is undertaken through appropriate programmes in the Five Year Plans adopting suitable strategies. The Planning and Statistical

Division in the Ministry maintains the necessary link and co-ordination with the Planning Commission at the Centre and the State Education Departments.

2.5 (b) As a result of the planned educational efforts so far, the country has steadily moved towards the realisation of the constitutional directives of providing free education to the children in the age group of 6—14. The programme of universalisation of elementary education with special emphasis on girls' and the weaker sections education and the eradication of adult illiteracy are included in the Minimum Needs Programmes of the Sixth Plan. The fulfilment of the constitutional directive of universalisation of elementary education by 1990 is the goal of the 20-Point Programme launched in January, 1982.

Educational Administrative Set-up

- 2.6 The Ministry of Education plays a major role in ensuring a coordinated development of education all over the country. The States have the major responsibility in administering education, particularly at the school level.
- 2.7 For the coordination and determination of standards in higher education, the University Grants Commission has been established by legislation. The National Council of Educational Research and Training is engaged in promoting the quality of school education throughout the country. The National Institute of Educational Planning and Administration (NIEPA) provides technical support to the Ministry in educational planning and administration.
- 2.8 At the State level, by and large the State Education Department is vested with the policy, coordination and administration. The Directorates of Education are responsible for implementation, through the region/district and

block levels organisations. There are also several other educational programme e.g. in the field of Health, Agriculture, Labour, etc., looked after by a number of other Ministries/Departments both at the Centre and the States.

Outline of the Educational Statistical System

- 2.9 Educational Planning, policy making and evaluation, depend on a good statistical service, which is major responsibility of the Ministry of Education at the Centre and the State Education Departments. educational statistics also serve the need of educational research and dissemination of information for use by various national and international agencies. Educational decision making/planning in the country largely rests on the statistics collected by the Ministry of Education, and its sub-formation as an integral part of their regular functions, with such supporting general statistics and information as collected by the Office of Registrar General, the Institute of Applied Manpower Research, the National Sample Survey Organisation, the Education Ministry and other similar agencies. The type of educational statistics collected and compiled by the organisations concerned is suited to their requirements.
- 2.10 Under the existing system of collection of educational statistics, the Ministry of Education obtain certain basic data from the State Governments collected annually on census basis. The basic constraint is the size of the educational system of the country which consists of nearly 6.75 lakhs educational institutions. The lack of adequate staff at various levels and of modern data processing equipment come in the way of collecting detailed data on census basis from all the educational institutions. Efforts are, therefore, being directed to collect some data on sample basis. Very recently certain theme-oriented 7 Edu.—2

studies have also been taken as a regular function of the Ministry of Education.

2.11 Apart from the Ministry of Education & Culture as earlier mentioned, information on education is collected by a number of agencies viz. University Grants Commission (UGC), Planning Commission, NCERT, National Sample Survey Organisation (NSSO), Registrar General's (Census) office, etc. The National Council of Educational Research & Training (NCERT) collects some data as part of the All India Educational Surveys which are generally conducted once in 5-6 years. Excepting the Third Educational Survey, these surveys covered only school education information on various aspects of educational facilities in schools, etc.

2.12 The U.G.C. collects information from universities and colleges. These statistics are collected on census basis. The Planning Commission collects information from the States on selected items like enrolment at various stages of education in institutions of various types, teaching personnel, expenditure incurred or likely to be incurred on specific education programmes. The NSSO collected some data on education during its 27th, 32nd, 34th and 35th round. In the 34th round, detailed information has been collected about the statistics of unrecognised institutions in the country. The RG's office provides information on literacy, educational attainments of population, and the population enrolment in schools and other educational institutions. This is done every 10th year as part of the population census. The Directorate General of Employment & Training collects information from employment exchanges about teachers seeking placement assistance.

2.13 At the Central level, the Committee assigned the responsibility to the Education Ministry for collection of

data from the State Governments. It would be incumbent on the other Central agencies to consult the Education Ministry before collecting data on their own from the State Departments.

2.14 In the State Education Departments, the Directorate of Education co-ordinates—the State educational activities. They are the primary agencies responsible—for collecting, compiling and disseminating State educational statistics. Information is collected by the Statistical—Unit located in the office of the Director of Education. However, in some States, information is being collected and consolidated by more than one Directorates and then supplied to the Statistical Unit which is functioning under one—of the Directorates.

2.15 The States supply data in the forms prescribed by the Ministry of Education for which purpose they have their own data collection system. The collection of data is done at three levels. The collection of statistics of the primary and middle schools is generally done at the block level, whereas the district level is concerned with the consolidation of block-wise returns of the primary and middle schools, and the collection and compilation of data in respect of high/higher secondary schools. The pattern, however varies from State to State. The State Headquarter collects data in respect of institutions of higher education and consolidates the other material received from district education offices, for the whole State submits it to the Ministry on its prescribed forms. A flow chart showing the system of collection of the educational statistics is given in the Annexure V.

2.16 In the system of collection of data in the various States UTs by and large, the statistical units collect information on an annual basis through prescribed forms.

Besides, the state inspecting/supervisory agency at the different levels usually collects information on traditional type of statements separately on students, teachers, expenditure, etc., on monthly or quarterly basis. In many of the States, educational planning being the responsibility of administration or budget section the planning unit also collects information besides the statistical unit. The Committee noted the multiplicity of agencies collecting educational data within and outside the education departments, without effective coordination.

2.17 The practice of different central government agencies collecting statistical information directly from the different units of State Government results quite often in divergent data being furnished on the same item. The Committee, therefore, recommends assigning the resthe statistical furnishing data to for ponsibility State Education Departments. In units in the event of these statistical units being identified for purpose of the data, there is no need for other units of the State government to collect on their own. For such of the material not available in the process of normal collection by the State Statistical Unit, the department/unit concerned may be required to consult the State education statistical units, before taking up collection on their own. It would be for the State statistical unit to advise on the need for collection of additional information sought, its scope, coverage and frequency of data collection.

2.18 The Education Ministry also collects data on foreign students in India and Indian students going abroad, Boards of Secondary Education examination results and selected educational statistics. The Ministry of Education also started collecting statistics relating to Correspondence Courses in India as part of its theme-oriented studies.

- 2.19 The educational statistics collected by the Ministry in ES forms I to VI thus covers the entire educational system in the State, right from pre-primary to the post-graduate/doctorate level. The Ministry of Education supplies the printed forms to all the States according to their requirements, together with model proformas to collect statistics from institutions. To ensure accuracy in the collection of educational statistics, the Ministry has prepared a Manual of Instructions giving concepts and definitions for use by the State Governments, both at the State Headquarter and the district offices for filling up the statistical return.
- 2.20 The Ministry of Education also organises training courses for the statistical staff engaged at the State Head-quarters to explain to them the various concepts and definitions given in the Manual of Instructions and other points in regard to scrutiny of data. Besides, the Ministry of Education also deputes resource personnel to the State Governments in helping them to conduct training courses for the district/block level officials on this job.
- 2.21 The data furnished by the State governments in these forms are scrutinised by the Statistical Wing in the Ministry of Education and the various points of discrepancies are reconciled and finally published in the annual publication of the "Education in India" series.
- 2.22 The Committee noted that after the introduction of the revised system, the Education Ministry has brought out the 1976-77 numerical data in 1980 and that of 1977-78 in 1982. While there has been some improvement and the time-lag is not so large as it used to be, the Committee felt that efforts should be made for further reducing the time-lag without sacrificing information. Considering that time-lag in data collection is a major factor contributing to the delays in the publication of data, this

requires to be constantly followed up. The Committee. therefore, recommends that the Ministry of Education should present an annual review of the progress of collection and dissemination of statistics which may be annual conference of the discussed at the Ministers. Further, the system envisaged a good deal of support material through survey and theme-oriented The studies. Committee noted that certain are under way. The Committee is of the view that this activity should be built up on a regular basis, and for this purpose the statistical machinery available in the Education Ministry and in the State Education Departments should be strengthened and the technical competence enhanced to undertake such work.

2.23 The NCERT collects data periodically through All India Educational Surveys in the country. The last survey was conducted in 1978-79 and the All India Report thereof published in 1982. Comprehensive data relating to school education is covered in these Surveys. undertaken by the State Governments Surveys are whereas NCERT provides academic and technical guidance. The Survey Unit at the State and district levels are responsible for conducting the Survey. Orientation to the State Survey Officers in organising the Survey imparted by the NCERT. The State Survey Officers conduct orientation courses for the District Survey Officers who in turn train the Block Education Officers. On completion of the Survey, national tables are completed the Survey and Data Processing Unit of the NCERT. Besides the All India Report published in 1982 and a preliminary report published in 1981, Statewise reports have been also prepared by some of the State Survey/Statistical Units.

2.24 The Committee suggested that NCERT and other agencies while conducting Al! India Survey may also

collect data on the items now being covered in Form ES VI (quinquennial collection by the Ministry of Education).

2.25. The Committee recommends that the conduct of All India Educational Surveys by the NCERT should be a regular feature, once in five years. The scope and coverages of the surveys should be decided according to the requirements on each occasion. It is desirable that the reference date and concepts and definition of the used by the NCERT are such as to maintain continuity with the annual statistics collected and compiled by the Ministry of Education. The next all India Educational Survey may be taken up in 1983 and planning for this should commence immediately. The data collected should be available within a year thereafter so that the data can be helpful for the preparation of the Seventh Five Year Plan. It would also be desirable to have the educational survey data in future too being made available well in time for the formulation of the next Five Year Plans. It is also necessary to have periodical comprehensive educational surveys in regard to higher and professional education too by appropriate agencies and the survey data should also be available for the formulation of Five Year Plans well in time.

2.26. Information on higher education which is of relevance to its own work is collected by the UGC. The schedules B-3/B-4/B-5 currently being used for collecting data have been revised largely in consultation with the Ministry of Education and Culture to serve the needs of not only the U.G.C. but also of other agencies. The collection is done directly from the colleges and universities and published by the UGC university-wise. The main statistical publication of the Commission is "The University Development in India—Basic Facts and Figures." It was noted that the collection of educational statistics in respect of higher educational institutions has also been

undertaken by the Ministry of Education through the State Governments. This data covers all the universities, affiliated and non-affiliated colleges, as well as non-affiliated courses and school classes attached to affiliated institutions of higher education. This data is compiled and published by the Ministry of Education State-wise.

- 2.27. The Committee recommends that work relating to collection of educational statistics in respect of universities and affiliated colleges may be taken up by the UGC. The Ministry of Education may, however, continue to collect data in respect of non-affiliated institutions and also about the schools|school classes attached to institutions of higher education. Pending the transfer of work, Education Ministry should, however, collect data from all types of higher education institutions for a period of two years for maintaining the continuity of the statistical series
- 2.28. At the national level, the Directorate of Adult Education introduced a carefully designed monitoring system which apart from furnishing statistics helps timely corrective action—being taken. The data flow process commences from the adult education centre, and flows through the project level State level to the national level. Two way flow is maintained at all levels to enable the project officer/State level—officer—to—monitor—progress and take remedial measures. The Committee expressed its satisfaction with these arrangements and recommends that the basic data in regard to adult education centres be incorporated by the Ministry of Education as a part of its annual collection.

Concepts and Definitions

2.29. The Ministry of Education has adopted the standardised definitions and concepts as recommended by

the UNESCO keeping in view the Indian situations. The Committee noted with satisfaction that the concepts and definitions adopted by the Ministry of Education are mostly in conformity with the UNESCO's recommendations and well-adopted to suit India's system of education. The Committee, therefore recommends un form adoption of these concepts and definitions by all agencies concerned with the collection and compilation of education data at the Centre like UGC, NCERT and others, as well as the State Governments.

ISCED Classification

- 2.30. The ISCED classification of education as suggested by UNESCO envisages collection, compilation and presentation of data by (a) level, (b) fields of study (courses), and (c) detailed programmes under each field of study. This is called 5-digits classification, levels being denoted by the first digit, fields courses in the next two digits, and programmes in various fields courses by further two digits, so that in total it becomes five digits classification.
- 2.31. While the Committee appreciates the efforts made by the Ministry of Education to adopt ISCED classification, it is of the view that the various concepts and definitions used in educational statistics should be further standardised, wherever necessary, and adopted uniformly by various agencies concerned with educational statistics at the National and State levels. It would be desirable to incorporate these concepts in the syllabus for teacher training courses. It would also be necessary to bring out a handbook explaining the concepts and definitions for the use of educational administrators.

Scope and Coverage of Educational Statistics

2.32. In regard to the scope and coverage of educational statistics, brought out by the different agencies,

the Committee noted that the educational statistics collected are only in respect of the recognised institutions in India whereas a number of institutions, themselves unrecognised are offering instructions for regular courses of study.

2.33. Similarly, the structured formal system alone is being taken into account, almost to the exclusion of the non-formal system such as correspondence courses, etc., which are otherwise well recognised. To the extent that these statistics are ignored, the official statistics do not present the total education effort.

2.34. It was noted that the non-formal system of education is yet to be defined in our statistical system. A very broad classification of the non-formal educations relating to out of school education or outside regular programme unlike the formal system was not considered adequate. Classification on the basis of the institutions engaged in the activity was also not proper inasmuch as the nition of 'recognised institutions' was comprehensive and apply for both formal and non-formal education. Considering that both recognised and non-recognised institutions will be operative in the field of non-formal education and taking into the view the difficulties in the compilation of data relating to courses operated by unrecognised institutions, the Committee recommends that for the present the statistics in regard to non-formal education be collected only in respect of the programmes organised by It would, however, be recognised institutions agencies. necessary to make a distinction between the non-formal education programmes which are intended to lead specifically to a link with formal system or for appearing in the public examination, with those which are not so intended. The collection of data in regard to the variety of programmes is more an administrative need of the agency concerned

- 2.35. After careful deliberations on the nature of the non-formal education courses available in the educational system and the need for educational statistics in regard to these courses on the one hand and the feasibility of collection of data from the recognised and unrecognised institutions relating to these courses the Committee gives the following recommendations:—
 - (a) Relevant educational data should be collected in respect of recognised institutions in regard to both formal and non-formal courses of education by the Ministry of Education or through other Departments administering the educational institutions, if considered necessary.
 - (b) The data in respect of unrecognised institutions relating to formal education should be collected by NSSO as part of their annual rounds on periodical basis.
 - (c) In regard to unrecognised institutions dealing with the non-formal education, special surveys or studies be taken up, according to the needs, as regular collection is not feasible.

However, in view of the increasing number of unrecognised schools it is desirable to have a system of compulsory registration and submission of statistics. This has been further discussed in a subsequent chapter.

2.36. The Committee expressed concern in regard to the quality of the data collected, particularly relating to the school stage. Generally, it has been observed that there is tendency to over report in classes I—V for certain extraneous benefits inbuilt in the administrative system By and large, the school data is collected from schools through teachers. There is no system of checking the data, even during the inspection of the schools. Whereas

it is desirable that the State Governments made it obligatory on the part of the inspecting staff, to check the details during their school inspection, this procedure may not have much impact as inspection machinery is not of adequate strength. The Committee, therefore, recommends sample studies being undertaken to test the quality and reliability of educational data collected by the States, such studies should be taken up both by the State and Central agencies engaged in statistical activities.

2.37. The Committee observed that a large amount of available data should be analysed. Strengthening of the machinery with qualified staff at the Centre and States would be necessary to undertake work relating to projection, forecasting and model building, including timeseries analysis, and research studies based on primary and secondary data which may help the policy makers, planners and administrators. The problem of storage and retrieval of data is quite serious in most of the States. Statistical returns are destroyed after 2-3 years as a result of which a lot of useful data is lost without being fully analysed. Besides, it also creates problem in reconciling any discrepancy which is noticed at a later stage. The Committee recommends increasing use of computerization of the educational data to the extent possible, which will help in the preservation and retrieval of such data.

CHAPTER III

EDUCATIONAL STATISTICS FOR PLANNING AND MANAGEMENT

- 3.1 The concept of education as a basic input for human resources development is the guiding principle for educational development in the Sixth Plan. This underscores the responsibilities on the State to provide education opportunities to all, facilities for continuing education and relating education to work and development. Notwithstanding the tremendous expansion of facilities in the three decades of planned development, there exists wide inter regional disparities. A huge backlog of unenrolled children, increasing number of illiterates and a growing number of educated unemployed are some disturbing features hampering progress.
- 3.2 The emphasis in educational planning has so far been more on quantitative expansion rather than on quality aspects. The process of planning and its decision making was earlier essentially centralised. The implementation of the Plan Programme have since been decentralised to a large extent. However, planning at the district level is yet to become a reality. The data base for policy making has also been found insufficient.
- 3.3 The absence of a proper information system to provide access to the data available even within the existing system has been keenly felt. Only a limited amount of data is being tabulated and much less utilised by the planners and administrators. The Committee, therefore, stressed on the need for collection of information with a definite goal and its processing according to a fixed time schedule for its effective use for planning.

Improvement of Existing Data

- 3.4 To identify the data gaps in the existing system, the Committee circulated a questionnaire, to the various user organisations, e.g. IAMR, Planning Commission, etc. (Annexure IV). While examining the several items identified by these organisations, there was a general consensus that the collection of data in respect of all the items under the existing system may continue subject to certain minor changes being made as given in Annexure VII Instead of composite ES. I-VI Forms being used for data on schools and colleges, two types of forms be used, one for schools and one for colleges. This procedure will help in finalising the school data ahead of higher education statistics which generally pose problems of collection.
- 3.5 For making enrolment projections and for assessing the enrolment ratio at the elementary stage, it is necessary to collect data on the age of students by sex and grade. Such data, by single year of age, should be collected once in 5 years for class I to X at least on a sample basis.

Income and Expenditure Data Reclassification

- 3.6 The data on income and expenditure of schools should continue to be collected annually. At the elementary stage, the data should be only on (a) teacher salaries (b) other recurrent costs grouped together and (c) capital costs; at higher levels, a more detailed classification of items of expenditure is necessary. Except for private schools, the financial data should be collected directly from the concerned educational authorities, who prepare the budget and maintain the record of accounts.
- 3.7 Data on the results of public examinations at the end of grades VII or VIII should be collected on periodical basis from the concerned examining bodies and compiled at the state level. For the examination results of the

Secondary, Higher Secondary and University examinations, the relevant data should continue to be collected from the concerned examining bodies and compiled at national level. The data should show results by sex, Sceduled Caste Scheduled Tribe, regular private students and passing division (where possible) for the different examinations.

3.8 Some of the major data-gaps unanimously pointed out by the user organisations are non-formal education data, dropouts and repeaters data for study of wastage and stagnation, attrition rates relating to teaching profession for purposes of man-power planning. Data on attendance in schools, cost of education at different levels, data on extra curricular activities are certain other items sought by more than one organisation.

Data Gap Non-Formal Education and Institutions

3.9 A detailed discussion took place in regard to the need for collection, and the problems relating to collection of data of non-formal education which is under recognised and unrecognised sectors. Notwithstanding the problem of collection, it was realised that such type of data is necessary as the total contributions of technical man-power provided by the type of institutions falling under this category, is quite significant. Besides, the contribution of unrecognised institutions providing both formal and non-formal education as a parallel system is fairly significant and it can no longer be ignored in educational planning.

The committee, therefore, recommended that:

(i) The Education Ministry should collect, additional data in respect of all types of non-formal courses for which there exist recognised organisations to register students for such courses, directly from the organisations concerned.

- (ii) The coverage of non-formal education for children in age group (9-14) and Adult education which are the important programmes of the Sixth Plan should also be made, through the administrative agencies (i.e. school|Adult Education Bureau of the Education Ministry). The data for the non-formal schools education should be on the same pattern as for the formal school system.
- (iii) The Ministry may request the CSO to undertake the collection of data in respect of unrecognised non-formal institutions at the time of conducting the economic enterprises census.
- (iv) The NSSO should cover in their annual rounds, data in respect of unrecognised educational institutions preparing students for formal courses on priodical basis.

Date Gaps-Wastage and Socio-Economic Background

3.10 The data on dropouts repeaters is of three fold utility for educational planning. It helps in the assessment of the internal efficiency of the system and evaluate the returns derived on the investment made. The data is also required for future planning of educationists, i.e. for projecting the enrolment for future years and for building up facilities consistant with the actual needs, particularly in view of the limited resources. the analysis of such data if available will provide a good insight into the problems responsible for the wastage and for considering remedial measures. However, this would require some basic data on educational wastage collected, preferably every year along with the enrolment data in respect of dropouts and repeaters class-wise, sex-wise and treget group-wise. Considering the dimension of

problem, the Committee recommends that in any case, studies on wastage and stagnation should be taken up in depth preferably districtwise separately for SC/ST and sex. These studies should be entrusted to research agencies including NCERT. Sample Surveys of Educational Achievements were also suggested, to be taken up periodically. Similarly the data on socio-economic background of students, may be collected by NSSO, on a periodical basis once in 5 years, in their annual rounds.

Data Gaps-Attrition Rate of Teachers

- 3.11 The data on attrition rate of teachers are required for estimating the teachers requirements while preparing an educational plan. At present there are no data on attrition rate of teachers, which on arbitrary basis is assumed to vary between 2% to 1%. Under the existing system, adequate information in regard to availability of qualified teachers particularly in the science subjects and their turnover is not available in most of the States. The Committee observed that the data on attrition rate of teachers at various levels and subjectwise should be collected from administrative records maintained by the State Departments/Local Boards but in respect of Government aided and Private schools such data should be collected from such institutions.
- 3.12 The Committee recommended the NCERT to take up collection of data on attrition rate of teachers once in 5 years in their All India Survey.
- 3.13 Considering the importance of school attendance in assessing the efficiency of education system for the purposes of educational planning there is need for regular collection of school attendance class wise and sex wise. A national programme of monitoring of school attendance on the basis of reports, from Bleck Officers was introduced 7 Edu.—3

two years back but due to very poor response, no useful data could be compiled.

- 3.14 The Committee considered it unrealistic to collect data on school attendance for all classes from all schools every year along with other data. However, enrolment on a given date is not relevant without attendance data which vary month to month. It is also necessary that data on the average attendence is collected on a quarterly basis to give the correct picture. It was, therefore, felt that such collection should preferably be done on a sample basis at Block level. For this purpose, school should be required to maintain full record of monthly attendance and the information compiled at the Block level according to a suitable procedure should be evolved.
- 3.15 Sample investigations/studies can also be made in a limited number of schools in each State.

Data on Cost by Level of Education

3.16 In respect to the collection of data on cost by level of education, the working paper prepared by the IAMR was carefully considered. Defining cost as an outlay or expenditure in terms of money, time and efforts, cost of education has to be computed taking several figures which in any case do not include the amount spent by the students on books, etc. By and large, in the educational statistical information, data on expenditure under recurring and non-recurring are provided for affiliated and non-affiliated institutions. The data for Degree P.G. courses are, however, merged together, faculty-wise. Similarly in the case of schools where there are two or more stages, there are problems of demarcating of expenditure-data level-wise. These problems, which are due classification procedure could be sorted out if the data is reclassified on a suitable basis, i.e. level-wise

- 3.17 Besides, for purposes of costing, certain studies are required to be undertaken to cover the gaps in regard to work distribution of teachers, non-teaching staff and capital component of per student expenditure.
- 3.18 The Committee agreed with these views generally and recommended special studies being made namely (i) Study on workload distribution of each category of teaching staff belonging to each type of higher education institutions. (ii) Study on workload distribution of teachers belonging to each stage of the different types of schools i.e. combination of two or more than two levels of Education (iii) Provide benchmark estimate of capital cost of education by level and specialisation. The Committee was of the view that these should be entrusted to agencies with competent staff, engaged in research studies. As it will be extremely difficult to collect data from all institutions, the studies need to be made on sample basis and taken up for specialised courses like engineering, medicine, etc., by IAMR and other such agencies for the type of studies.

Additional Data on Extra Curricular Activities

3.19 In the Third and Fourth All India Education Surveys, some information has been collected on the facilities available for extra curricular activities in schools. These surveys could be expanded in future to cover information relating a wide variety of activities such as games outdoor or indoor, NCC/Scouts/NSS, debates, music and dance, science clubs, etc.

Education Disparities-State/District Profiles

3.20 An important objective of educational planning is the equitable distribution of education provision. The district studies undertaken by the Education Ministry are useful in the context. The All India Educational Surveys conducted by the NCERT also contain a vast amount of data of immense utility to the State Governments. It would be desirable for the States to publish regularly districtwise statistics and information already available and to promote studies on the basis of such information.

Management Information System

3.21 Education Plans will have to be prepared for each level at which decisions are taken i.e. the institution, groups of institutions, the block taluka, the state and the national level. Comprehensive educational planning quire many components other than educational statistics. Only a few States UTs have got decentralised system education planning like J&K, Maharashtra, etc. In most of the States/UTs, process of implementation and not the formulation of plan action is decentralised. A pre-requisite for decentralised planning at the district level would be well-organised system of management information which would provide a sound data base for the inter related activities of planning and monitoring and evaluation, The Management Information System operating in J&K was studied by the committee. A model for the Management Information System based essentially on the J&K pattern is given in the Annexure VI. It is suggested that, following these guidelines, suitable M.I.S. for education should be developed by each State, to meet the requirements of decentralised planning administration. take time and extra resources to introduce such a system; but when introduced it would lead to regular flow of statistical information for various purposes.

Interaction With User Organisations

3.22 A comprehensive educational planning involves several other components besides educational statistics. To establish this link with other agencies involved and to

provide a regular interaction of the user organisations, the Committee recommended the need for larger participation of these organisations in the standing committee on educational statistics. A committee of this type may be set up at the State level also,



CHAPTER IV

ORGANISATION AND MANAGEMENT

4.1 The organisational set up of the Educational Statistical Units at the different levels assume immense significance in view of the vast dimensions of the Indian educational system consisting of about 11.5 crores of students, about 32 lakhs of teachers and 6.75 lakhs of educational institutions at various stages of education. This aspect, therefore, came up for special scrutiny of the Committee.

Central Machinery

- 4.2 The Central machinery for collection of data comprises of the Statistical Unit of the Ministry, NCERT, UGC and the Directorate of Adult Education.
- 4.3. Education Ministry has a Planning, Monitoring and Statistics Division functioning under Deputy Secretary who supervises all the Units of the Division, viz. Policy Norms Planning and Monitoring Unit, Paper Unit. Unit. and Students Information Service Unit addition to the Statistical Unit. The Statistical is headed by an Officer of the rank of Deputy Director who is assisted in his work by two Research Officers, three Assistant Education Officers and a supporting of 7 Senior Investigators and 9 Statistical Assistants and Computers.
- 4.4 In addition to the statistical machinery working at the Ministry, NCERT and UGC also have separate units for statistical work. NCERT has got a Survey and Data

Processing, Unit which has professional staff consisting of one Professor, two Readers, and about 10 Lecturers. The Unit employs temporary research staff (senior and junior project fellows) when they undertake some major project for which such staff is required. The Unit normally has several other projects and was assigned the responsibility of conducting All India Educational Survey. The Statistical and Information Unit of UGC is headed by Joint Secretary who is assisted in his work by a taem consisting of Senior/Jr. Statistical Officer and Statistical Assistants,

4.5. Nearly all the States/Union Territories have got a separate statistical unit existing in their Education Department. These statistical units are generally headed by an officer of the rank of Assistant Director or Statistical Officer in a Junior Class II grade only. Only two namely Rajasthan and Maharashtra have got statistical units headed by officers of the rank of Deputy Director (Class-I). Statistical Units in the State Education Departments are generally located in the office of the Directorate of Public Instructions/Education. In States, where are more than one Directorate, the Statistical Unit a located within one of the Directorates, usually the Directorate concerned with school Education. However, it also undertakes the collection of statistics in respect of institutions falling under the control of other Directorates directly or through the help of the concerned Directorates, The system however, differs from State to State In States, viz., Bihar and J&K, the Statistical are located in the Secretariat.

4.6 At the district level, generally there is one statiscal assistant/clerk doing the work of collection of statistics in most of the States. But there is no separate statistical staff at Block/Taluka level in any of the States except in Jammu and Kashmir in which there is a post of Tehsil

Planning Assistant who among other things is responsible for collection of the required statistics in respect of primary and middle schools. The Committee noted that in a number of States other Departments such as Agriculture, Health, etc., have adequate machinery in comparison to the Education Department. The Committee would like to emphasise the need for qualified statistical staff atleast at the district level, if not at the block level.

Co-ordination

- 4.7 As already mentioned in the earlier chapter—the central agencies need to function with clear cut demarcation of responsibility. To ensure—greater—coordination/among the agencies and the user organisations, the Committee recommends the representation of user organisations in the Standing Committee of Educational Statistics, both at the Central and State level. It is further suggested that the Standing Committee should meet—regularly—every quarter.
- 4.8 In the light of their recommendations for undertaking sample surveys, studies/investigation of specific areas, theme—oriented studies on a larger scale by all the agencies, the Committee feels that the Statistical Units would require improvement of strengthening of the professional competence.

Strengthening of the Machinery

4.9 The existing Statistical Unit of the Ministry of Education, the Committee noted, is mainly geared to the compilation/publication activities, besides dissemination of certain general educational information e.g. pay scale, school information, etc. The research/study work is required to be established, as a regular function of the Statistical Unit. In regard to the compilation work also, it was noted that the staff is required to undertake extensive tours for

expediting collection of data and reconciliation as well. This factor should not be ignored in the assessment of staff requirements. It was also observed that the staff for tabulation work was just sufficient for the present slow pace of work and not when tabulations are taken up for Educational statistics series one after the other. For reducing the time lag in the compilation, tabulation, publication processes, it is necessary to provide extra hands.

- 4.10 The present Statistical Unit needs to be entrusted with the tasks of planning, research, evaluation and monitoring pertaining to maintenace of All-India Educational Statistics and for this purpose it should be suitably strengthened. It should be headed by a competent and experienced professional statistician, who should serve as Statistical Adviser to the Ministry of Education. This is also in accordance with the recommendation of the Committee to Review the National Statistical System in India (Recommendation No. 10.1 of the Report published in June 1980).
- 4.11 The Committee is of the view that existing professional staff in the Statistical Unit is far from adequate for the present task. When the recommendations of this Committee are implemented, the Unit will have further responsibilities requiring further strengthening. The Committee, therefore, recommends that the staff requirements are properly assessed and suitable steps are taken to strengthen the staff at all levels.
- 4.12 The Committee took note that the UGC has gone ahead with certain re-organisation and strengthening of their unit. The NCERT will also require further strengthening of staff in order to cope with work of organising All India Surveys on regular basis as recommended earlier. The Directorate of Adult Education is presently well geared to their tasks of collection of data.

Organised Pattern in the States

4.13 It is recommended that top priority for strengthening of staff should be given by the concerned authorities particularly in those states where the existing machinery is comparatively weak. The States should prepare proposals for strengthening and expansion of the Statistical Unit of the Department of Education and the proposals should be included in the State Plan proposals.

Problem of Co-ordination in States

4.14 The issue relating to multiplicity connected with the data collection and the remedial measures in this regard is separately discussed in the succeeding chapter. The absence of proper coordination amongst the Directorate of Education on the one hand and the lack of response from other departments concerned with educational institutions are, however, a matter of greater—concern, these being the major causes for delay in the collection of statistics. To overcome the practical difficulties and to ensure greater—coordination—in educational planning, the Committee recommends that the Head of the Statistical Unit should be directly responsible to the Education Commissioner/Secretary.

4.15 It was also noted that the staff is not adequately qualified and trained. Frequent transfers are also regular feature. Apathy on the part of the statistical staff is not uncommon because of the low priority given to statistical work and its non involvement with the process of planning and management in many of the States. Most of the State Governments do not have a clear cut policy for recruitment and cadre development for staff entrusted with statistical work in the Education Department at different levels.

Statistical Machinery in States

- 4.16 The Committee, however, recommended certain broad guidelines to be followed by the State Governments, as outlined below:—
 - (a) The planning, statistics and monitoring unit in States should be under the overall charge of a senior officer, preferably not below the rank of Deputy Director, if required, one or two Assistant Directors should also be provided to assist in the work of planning, monitoring, statistics and Survey, etc. In case of bigger states like U. P. and West Bengal, there is a need to have at least one post of Deputy Director who should be exclusively incharge of work of statistics only, whereas the complete work of planning, monitoring and statistics unit may be headed by an officer, say, of the level of Joint Director or Additional Director.
 - (b) In case there is only one Directorate of Education, the above unit could also be located there. In case of those States where there are more than one Directorate the Unit may be located in the Secretariat. However, there should be at least one Assistant Director in all the Directorates of Education to provide the relevant statistical information to the main unit located in the Secretariat which may coordinate their functioning.
 - (c) At the district level, the task of planning, monitoring, statistics, evaluation and conducting of required surveys should be exclusively looked after by an adequately senior officer. According to the work load involved, this officer may be assisted by one or more Statistical Assistants.

- (d) At the block/taluka level, the Education Officer should himself look after the work of planning monitoring and statistics and survey of the area under his jurisdiction. Strengthening the data base at the block level being crucial for planning and monitoring of educational programmes at grass root level, there is a need for providing a full-time Statistical Assistant to assist him in the work.
- (e) Officers heading the statistical and survey unit at the State Headquarters may be drawn from the State Statistical cadre, if any. Where there is no State Statistical cadre, the recruitment to the posts should be made only from amongst those who have a post-graduate degree in Statistics, Mathematics or Economics and with experience in Educational Administration.
- (f) Officers for planning and monitoring at the State level and for all such work of statistics and survey at the district level may be drawn from the Educational cadre but their selection has to be carefully done keeping in view their aptitude for planning and statistical work. For such type of posts it would be better if selection is made out of only those persons who have got a post-graduate degree in Statistics, Mathematics or Economics and Education. The talented teachers and headmasters from the field can also be brought on deputation basis, against posts at the block/district level.
- (g) The field posts at district and block level should preferably be given special pay/allowance to attract and retain services of talented persons.

4.17 The main function of the Statistical Units at the different levels, are compilation and tabulation. For this, they distribute printed forms to the lower level. Most of the information compiled is done as a matter of routine and does not take into consideration the needs of various levels of administration.

Printing and Distribution of Forms

4.18 The printing and distribution of forms, is not standardised and results quite often in delay in the collection of information. If handled with expeditious and proper planning, this will greatly help in reducing time lag in data collection. Keeping this view, the Committee recommends that all types of forms should be got printed and distributed preferably at the State level but if necessary at the district level. The size, design and other particulars of the statements should be standardised by the State authorities for uniform use in all the areas.

Use of Computer

- 4.19 The compilation and tabulation work, both at the Central and State level is done manually with the help of calculators. The use of computer for this work should be encouraged for undertaking diversified and detailed analysis of the statistics collected.
- 4.20 The Committee considered essential that a Data Bank at the national level is set up in the Ministry which will be of help to different user organisations. Similarly, there is the need for maintaining at the field levels, i.e. block/taluk/district levels, a mini 'Data Bank' to meet demands for policy, planning and administration at these levels. For the preparaton of this material, the State Governments are recommended to use the All India Survey material, which contain wealth of information useful for the needs of district educational planning.

4.21 As observed in the earlier chapters, to improve the reliability of data, the supervisory as well as the statistical machinery should undertake checking of data as an integrated part of their regular duties. At least 10 per cent of the institutions should be selected at random for sample check.

Overall Supervision of Collection and Work Review/ Monitoring

4.22 For ensuring timely collection, compilation and publication of educational statistics, the Committee recommends that the periodic reviews monitoring of the work of collection of educational statistics is undertaken at the highest level, with the State Education Secretary as its Chairman. Corrective measures, if any, should be taken so as to give adequate importance to the work of collection of educational statistics and to remove all possible bottlenecks, and duplications which retard the speed of collection and compilation of educational statistics and affect the quality of data. It is further recommended that this Committee may review periodically the progress in regard to transmission to the Government of India of educational statistics in the States.

CHAPTER V

PROCEDURE FOR DATA COLLECTION

5.1 The existing procedure of data collection is based on complete enumeration of all the Schools in the country every year. All the recognised schools from the preprimary to the university level are required to complete a questionnaire in which some basic information is sought on enrolments. and number of teachers. The common pattern is that the data collected through these questionnaires for the primary and middle schools are compiled first at the Block/Tehsil/Taluka level, and then from the compiled Block level Tables, the District Tables are pre-The data from secondary and higher secondary schools are collected directly from schools by the District Education Officer/District Inspector of Schools. The trict Tables are finally sent to the State Headquarters where the State Tables are prepared. The data from the universities and colleges are collected directly by the Officer Incharge of Educational Statistics at the State Headquarters. The data in respect of institutions functioning under other departments such as Health, Agriculture, etc., are also collected directly from the institutions with co-operation of the concerned departments. Finally, all the State level Tables are sent to the Ministry of Education in New Delhi on certain prescribed forms for the purpose of compilation at the national level. Although there some variation in the procedure prescribed above depending on the administrative set-up in the States, the levels of compilation are more or less the same as above.

- 5.2 In addition to the educational data collected annually by the Ministry of Education with the assistance of State Governments. All India Educational Survey have also been conducted to collect data on educational variables which are not normally covered in the annual census. So far, four All India Educational Surveys been conducted. The first was conducted by the Ministry of Education in 1957 and the other three surveys been conducted by NCERT in the years 1965, 1973 and 1978. Although the specific terms of reference and the coverage have changed considerably from survey to survey, the main purpose of all these surveys was to provide data on habitations served by primary, middle and secondary schools, classwise enrolment. teachers by qualification. school buildings and other facilities in the schools order that the same could be used for the preparation of Five Year Plans in Education
- 5.3 Although in many of the All India Conferences on Educational Statistics which the Ministry of Education organises from time to time, recommendations have been made to use sample survey method for data collection and for conducting theme-oriented special investigations, so far only a few such studies have been conducted by the States. The main reason has been the lack of trained manpower and resources for conducting such studies. Some sample studies have been conducted by NCERT, Planning Commission and certain State level Agencies and Institutions, but most of these provide data only for limited geographical areas. Also there is no systematic pattern and most of the investigations have been undertaken on an ad-hoc basis.
- 5.4 The Committee, however, has taken note of a Pilot Project which was initiated by the Ministry of Education recently in collaboration with NCERT for collecting data

on some educational variables on a sample basis. This Pilot Study is being conducted in four States viz. Haryana, Bihar, Maharashtra and Tamil Nadu. It is hoped that the Pilot Project would lead to a suitable methodology for collection of data sample basis.

- 5.5 The Committee is of the view that different strategies and procedures of data collection should be used depending on the nature and purpose of the data. For educational planning, a good deal of data is needed on a number of educational variables. The data which are collected through the annual census do not adequately meet the data requirements of educational planning and administration. The data collected through the All India Educational Surveys fill the data gaps to a considerable extent, but these surveys have not been conducted with regularity and duc to various reasons in organising them there have been delays in making the survey data available to the users in past. It is necessary to use a combination of different methods of data collection including sample surveys to collect data on some educational variables for which the census method is not economical.
- 5.6 The Committee is of the opinion that the following four types of data collection programmes should be organised by the Centre in co-ordination with the States:—
 - (i) Annual Census of Educational Institutions;
 - (ii) All India Educational Surveys quinquennially;
 - (iii) Sample Surveys;
 - (iv) Theme-Oriented Studies.
- 5.7 In the Annual Census of Educational Institutions only some basic data should be collected about the schools, 7 Edu-4

enrolment and teachers. The following items are suggested on which data should be collected annually:—

- (i) Type of School P.M., P.M.S., etc., according to grade taught, management, (boys, girls or mixed); type of management; rural or urban;
 - (ii) Enrolment by grade and sex;
- (iii) Number of repeaters by sex in each class;
- (iv) Number of students belonging to Scheduled Castes & Scheduled Tribes by grade and sex;
- (v) Number of teachers by sex and qualification;
- (vi) Number of shifts;
- (vii) Number of scholars in each class.

This would imply that the schools should also be classified in the same manner as in All India Educational Survey namely, P, PM, PMS, etc. A simple questionnaire should be devised on which the above data should be collected on a fixed day in the year, say, September 30th. The data collected through these questionnaires should be compiled at the Block, District, State and finally at the national level.

5.8 It has been noticed that most of the States collect data on classwise enrolment and number of teachers every month from schools. Also in some States there are a few additional items on which data are collected in addition to those already prescribed by the Ministry of Education. The data which are collected monthly from schools are compiled only at the Block level and in some cases at the District level also. These data are mainly used for monitoring and administrative purposes at the local level. In addition to this, in some States, data are also collected once or twice in a year from the schools

for sanctioning grants to the school. There is hardly any co-ordination between the Departments or Units which collect data for different purposes in a year from the schools. The Committee feels that with better co-ordination there will be substantial reduction in the amount of data that the schools supply every year to different agencies for different purposes. Even for monitoring purpose, it should not be necessary to collect data enrolments, number of teachers, etc., every month. It should be sufficient if these data are collected once quarter and are compiled at the Block and District levels. There should be no separate forms and procedures collecting the same type of data for different purpose, such as for giving grants to schools and for compilation of educational statistics. The State Governments should devise a simple form on which they should collect all the data which are required for different purposes. If some additional data are required by the State Government, a few additional items could be included in the same form as the Ministry of Education prescribes for all the States.

5.9 The schools, in general, maintain certain Registers e.g. Attendance Register for recording attendance and Admission Register for recording age and other data relating to new entrants and schools leavers. In some States, teachers also conduct a door-to-door survey periodically to enumerate unenrolled children and their records. It is recommended that all the schools, should maintain at least four types of Registers, (1) Admission Register, in which information about students' of birth, sex, religion, mother tongue, parents' occupation and address; S.C. or S.T., date of admission, distance from home record of previous schooling, etc., is maintained and also information about those who leave the school recorded, (2) School Information Register, for facilities and equipment (building, covered area, furnitures and other equipment), participation of students in extra-curricular activities, games and sports, etc., is recorded, (3) Attendance Register, which is separate for each class and contains information on sex and date of birth of the student, whether the student is a new entrant, repeater or promotec, and of course, day to day attendance in the school, and (4) Teachers Register, which contains full data on age, qualification, subjects taught, residence, salary, etc., of the teachers. Private schools should preferably maintain an additional Register on income from different sources and expenditure incurred on different items each year.

5.10 The Education Officers working at the Block and District levels should maintain certain Registers for the schools of their area, which contain full information about enrolment, attendance, repeaters, teachers, facilitics, etc., for all the schools. They should also compile the data annually (or quarterly/half-yearly) to provide totals of grade-wise enrolments, etc., as per requirements of the State Educational authorities. Certain minimum data for the primary and middle levels of education should be available in easily retrievable form at the Block level and for other types of schools (and consolidated Blockwise figures for primary and middle schools) at the District level. At the District level, the basic data on schools, enrolment and teachers should also be published in the form of periodic statistical bulletins. Necessary guidelines for all this should be provided by PMS Division and SISUs, to the DEO's and BEO's

- 5.11 The original school returns should be maintained in the Block Education Office for at least three years, and the tabulated data for at least ten years.
- 5.12 The District-wise and Block-wise basic educational statistics should be maintained in an appropriate

form at the State Level/District level so that required information as be easily retrieved. The information should be maintained on number of institutions of different types, their enrolment and number of teachers.

5.13 The data on income and expenditure of schools should be collected annually. At the elementary stage, the data should be only on (a) teacher salaries. (b) other recurrent costs grouped together and (c) capital costs; at higher levels a more detailed classification of items of expenditure is necessary. In all those cases where the schools are fully financed by the Government or Local Bodies, such data should be collected from the concerned educational authorities who prepared the budget and other records of the State Governments and Local Bodies. In the case of private aided and un-aided schools where the Schools do not fully depend on the Government grants, a separate form should be used to collect data on the Income and Expenditure of such schools.

5.14 The data which are to be collected in the All India Educational Surveys should help in preparation and evaluation of Five Year Plans. As such, these Surveys should be conducted regularly at 5 year intervals. In these Surveys, data should be collected on items as may be deemed important at the time of Survey, especially in the context of the succeeding Plan. Some suggested items to be covered in such Surveys are:—

- (i) Rural habitations served by Primary, Middle and Secondary Schools within different distance slabs:
- (ii) Facilities for Non-Formal Education in the Rural Areas;
- (iii) Schools belonging to different Management categories, Boys, Girls and mixed, in Rural and Urban Areas;

- (iv) Enrolment by Grade, Sex and Age;
- (v) Number of Repeaters by Sex and Enrolment in the previous years (for calculation of drop-out rate);
- (vi) Enrolment for Scheduled Castes & Scheduled Tribes;
- (vii) Languages and Media of Instruction;
- (viii) Incentive Programmes with number of beneficiaries;
- (ix) School Buildings, Class-rooms, Covered Area and other Physical Facilities in the Schools:
- (x) Facilities for Games, Sports, extra curricular activities, Libraries and Text-book Banks;
- (xi) Scholarships, Stipends, Free-ships, etc.
- (xii) Facilities for Health check-up, Vaccination, etc.;
- (xiii) Number of Teachers by Sex, Qualification, Age, Scheduled Castes & Scheduled Tribes;
- (xiv) Number of Teachers qualified to teach different subjects particularly Science and Mathematics at the Middle and Secondary level.
- (xv) Attrition Rate of Teachers.

In general, in these Surveys, two separate schedules should be canvassed (1) Village Schedule and (2) School Schedule. In the Village Schedule, data should also be collected on the child population.

5.15 Since the number of un-recognised schools have been increasing in most of the States, it is necessary to collect some basic data from these schools also. Now these Schools cater to a sizeable child population not only

in urban but some rural areas also. It is not quite right if the children enrolled in these schools are counted as children out of school. At present these schools are not being covered under the data collection programme of the State Governments. In fact, these schools are not under of the State Education Departments the control therefore, it is not easy to collect data from them. However, since a large number of children are receiving education in these schools, particularly at the primary level, the Committee feels that such schools should also be counted and included in the data collection programme. Due to practical difficulties it may not be possible to cover them while conducting the annual census of schools; they should be covered in periodic Educational Surveys. Efforts should be made to count and cover such schools in Special Surveys.

5.16 In the quinquennial Educational Surveys, of course, data on more items can be collected but it can be done only once in five years. Since it is done on complete enumeration basis, it is not possible to ensure accuracy of information on some items which require careful scrutiny and checking of records. It is, therefore, recommended that Sample Surveys should be used more frequently for collecting data on items which are required for specific purposes and on which, it is very expensive and time consuming to collect data on a census basis. The Centre and State Governments should have programmes of conducting regular Sample Surveys to provide data on different educational variables from time to time.

5.17 The Committee feels that the Sample Surveys should be used for collecting data on certain items like age of students, students by sex and grade and by single year of age, socio-economic back-grounds, availability and utilisation of certain facilities in schools and other

characteristics of schools and teachers on which information is needed frequently, but is not covered in school questionnaire nor it is easy to collect the data on complete enumeration basis.

5.18 In each State there should be an infra-structure for conducting such surveys on a regular basis. While data on some selected items could be collected in each round of Sample Survey, it should be possible to include some new items in each survey depending on the need and the problems facing the education system at a particular time. The States should maintain lists of schools in such a form that good representative sample of schools could be drawn easily for such surveys. While the Statistical Units in the States which will be responsible for conducting these surveys, should gradually develop the expertise and facilities for this purpose, initially they should organise these surveys with technical from NCERT, Ministry of Education and the State Bureaus of Economics & Statistics.

5.19 The Sample Survey methodology should also be used for checking the accuracy of the data collected by the census method. There should be a system for checking 5 to 10 per cent school returns on a regular basis in order to ensure that the schools supply correct information. Such sample checking will not only provide an estimate of the error, but would have a positive psychological effect on the respondents. The Committee recommends that the system of sample checking should be introduced at all stages of data collection and compilation, and particularly for the data collected from educational institutions at school level.

5.20 In addition to the regular Sample Surveys, it is also necessary to have a system of collecting educational

data required for planning and policy making through special theme-oriented studies or indepth ad-hoc studies on certain problems to provide data which cannot be ccllected in large scale surveys. The Committee noted the recommendations made in the various Conferences educational statistics organised by Ministry of Education about undertaking such studies. However, due to lack of trained personnel and pre-occupation of the existing staff with the collection of annual statistics hardly any themeoriented studies have been undertaken by the States. Such studies should be conducted to provide data relating to specific problems being faced by the State Governments. In these studies, it may or may not be necessary to collect data from a large sample. These could also be one time studies to provide the relevant data for a specific problem, which need not be repeated. The following are some examples of the studies which would fall in this category:-

- 1. Diagnostic Studies such as studies for throwing light on the REASONS FOR DROPPING OUT and repeating at different levels of education;
- 2. Evaluating Studies such as studies for the different incentive schemes launched for attracting children to school;
- Status Studies such as studies for special educational programmes launched by the States, such as programmes of correspondence courses, use of mass media for education and other programmes of non-formal education;
- 4. Studies of the community and parents, through household surveys for collecting data relevant to educational planning (planning, curricula, determination of educational needs, identifying vocational courses needed in a given area, etc.).

The State Education Departments should be well equipped to conduct such studies from time to time. This type of work could also be entrusted to the State Institutes of Education and SCERTs. Depending on the type of data to be collected, the Statistical Units could also be given the responsibility for conducting them.

- 5.21 To sum up, the Committee suggests that the following four types of programmes should operate for collecting educational data:—
 - 1. Annual Census of Schools to collect some basic data on Schools, Students and Teachers;
 - 2. All India Educational Surveys conducted once in 5 years to collect comprehensive data on the existing educational systems;
 - Periodical Sample Surveys to collect data on such educational variables which cannot be easily covered in the Annual Census and on which data are frequently needed for educational planning and administration purposes;
 - 4. Theme-Oriented Sample Studies to collect data on specific problems confronting the educational system;

The data collection system should be so re-organised that all the above four types of data collection programmes can be efficiently undertaken in all the States,

Collection of Statistics for Higher Education

5.22 At present the data from universities and other institutions of higher education are being collected both by the UGC and the Ministry of Education through State Departments of Education. Although there is some difference in the items covered and also in respect of the date

that are collected by these two agencies. Recommendations have already been made by some earlier Committees and Conferences on educational statistics about the need for avoiding the duplication of work. A Working Group was set up by the University Grants Commission to look into the problem and to examine in detail the procedure of collecting data from the universities and other institutions of higher education. This working group has submitted its report and action is being taken to implement the recommendations made by it.

5.23 The Committee noted that the State Education Departments have experienced difficulty in collecting data from the universities and colleges and this has often caused delay in submission of educational statistics of the State to the Ministry of Education. The Committee is of the view that in future the University Grants Commission should assume full responsibility for collecting data from the universities and affiliated Colleges and they should provide copies of Institutional Returns and compiled data for the States in an appropriate form to all the Governments for their use and also to the Ministry Education. The State Education Departments may, however, continue to collect data from the institutions directly for their needs, as necessary. Regarding the programme of transfer of work from Ministry of Education to UGC, the Committee understands that the Working Group of the UGC has since submitted its report and that this report has been accepted by the Commission. It may, however, take some time before the work is taken over by the UGC has since submitted its report and that this reseries, the Committee recommends the Ministry should continue to collect data, say for a period of 2-3 years. So far as the non-affiliated institutions are concerned, it was noted that the UGC may not be in a position to assume the responsibility of collecting data from them. For these institutions, the Ministry of Education should continue to collect the data. But the source of data including non-affiliated courses in respect of affiliated institutions would be the University Grants Commission.

5.24. The Committee noted that the major drawback in getting the required statistics from the institutions of higher education was that the records are not properly maintained at the Institutional level. It is recommended that all the institutions of higher education should maintain an Information Register on which up-to-date relating to the students, teachers and educational facilities in the institution as well as the income and expenditure should be maintained in such a form that all the data needs of the various user organisations such as UGC, Planning Commission, IAMR and the Ministry of Education are adequately met. A format of this Register should be worked out by a Working Group consisting of representatives of various user organisations and some of the higher education institutions. It would be obligatory for all the institutions of higher education to maintain this Register.

Statistics of Adult Education

5.25. The Directorate of Adult Education has a comprehensive programme for collecting data in respect of the various projects of Adult Education that are functioning in the different States and Union Territories. Under this programme some data are collected quarterly by the Directorate of Adult Education and quarterly State Reports are issued which provide information on the number of centres operating in the different States, enrolment in these centres and instructors, supervisors and other staff engaged in these projects. These quarterly statements are

used for the purpose of monitoring and evaluation of the Adult Education Programme. The Committee noted that the programme of data collection as a part of the monitoring process is functioning smoothly in most of the States, although monitoring returns are not received regularly in respect of the projects being implemented by universities/colleges and certain voluntary Agencies.

5.26. The Committee attaches great importance to the regular collection of basic data in respect of Adult Education Programmes in the country. The programme may continue to operate under the aegis of Directorate of Adult Education but it is not necessary to collect the data on quarterly basis for the purpose of educational statistics. It may be alright for monitoring purposes, but the Directorate should provide annual statistics on the basis of their quarterly returns, which should be appropriately included in the educational statistics being compiled and produced by the Ministry of Education.

Statistics of Technical Education

5.27. At present the statistics of Technical and Vocational Education are collected by the State Education Departments along with the statistics of General Education. The Division of the Technical Education in the Ministry of Education also collects some data on the courses offered in the institutions and their intake capacity. The Committee feels that it is necessary to co-ordinate the efforts in this regard to avoid duplication of data collection. The main responsibility of collecting data from these institutions should be that of the State Technical Education Department.

Statistics of Non-Formal Education

5.28 There has been considerable growth of the centres providing non-formal education for the school, drop-outs in the country in recent years. So far, the data collection

in respect of these centres have been undertaken mainly to meet the administrative requirements. It is necessary that the Ministry of Education starts collecting regular basis data on enrolments, number teachers and other facilities in the non-formal education centres with the assistance of State Education ments. These data should be collected annually and should cover all the non-formal centres operating under different Agencies.

5.29. Apart from the non-formal centres meant for providing elementary education to the out-of-school children, there are also a number of un-recognised institutions in the country which provide some type of non-formal education of different levels and for different groups of learners. They include the private coaching institutions and the institutes preparing students for various academic, vocational and professional examinations. The Committee noted that it is extremely difficult to collect reliable statistics about enrolment, etc., from these institutions. ever, since they cater to the educational needs of large numbers, it is necessary to have some data on the students enrolled in these institutions, their teachers, rates of fees, etc. The Committee suggests that periodic survey should be conducted to collect data from these institutions under the auspices of the National Sample Surveys Organisation. Other concerned agencies may also organise surveys from time to time for the different types of non-formal education programmes.

CHAPTER VI

TRAINING

- 6.1. Training of staff is vital for the development of a system. This is particularly relevant on the field of educational statistics which is yet to find general acceptance and appreciation. The large number of personnel engaged in furnishing/collecting data have very little knowledge of this job. It is, therefore, necessary to provide for the training of the staff at various levels to improve the quality and reliability of educational data and to ensure better utilisation for planning policy formulation and administration.
- 6.2. At present, only limited arrangements of training are available both at centre and state level in the field of educational statistics. Further training is limited in the sense that it caters to the needs of only intermediate and primary level. The Ministry of Education conducts annual training courses in the field of educational statistics the benefit of Statistical Assistants working at the State Headquarters, whereas only a few States organise regional inservice training courses for the statistical personnel working at lower levels, namely, district and block level. Besides, a few States have also been conducting training courses for the statistical/clerical staff employed in universities and colleges with a view to improving the quality of data at institutional level for higher educational institutions.
- 6.3. Apart from the Ministry of Education, the NCERT also conducts training courses of short-term duration from

time to time. The orientation programme for survey staff conducting All India Educational Surveys covers the explanation of various concepts and definitions both in the work of collection and compilation of data at State Headquarter, district level and block level. Besides, NCERT also conducts workshops of short-term duration in areas as use of sample surveys methods in education, and use of All India Educational Survey data for planning at district/block levels. At present, UGC does not conduct any kind of training course in the field of educational statistics though such a need has been felt by that organisation also. In training programmes for educational planners and administrators, there should be provision component for orienting officers in concepts and methodo-. logy of educational statistics and their use in planning and administration.

- 6.4. For the collection of statistics relating to Adult Directorate Adult Education Programmes, the ofEducation organises special training orientation workshops on monitoring and evaluation for officers incharge of monitoring and evaluation at the State level. The schedules on monitoring and evaluation are also explained in its regular training programmes for State level and District level Officers where the need for relevance of monitoring procedures, types of data required and its frequency explained. The training of Project staff is organised by State Resource Centres/State Adult Education Officers and of field functionaries where the details of forms for collecting of data and its relevance in planning and improvement of programme are explained.
- 6.5. On the whole, the existing arrangements for training in respect of professional/semi-professional statisticians in the field of educatioal statistics were noted to be

inadequate. The Committee, therefore, examined in detail the training needs of the different categories staff engaged on this work at the various levels.

- 6.6. Training for statistical personnel in the field of educational statistics could be broadly at two levels:
 - (a) Training for Professionals: This will include training in the use of statistical methods analysis of voluminous data being collected and published by the various central and state orga-Here also there could be two sub nisations. levels—one for which the officers should have sufficient background in statistics and mathematics and another for those officers engaged in statistical work but not having sufficient background in statistics and mathematics. The Committee is of the view that such training is essential for the Statistical Officers incharge of collection of educational statistics in the State Education Departments and their senior subordinates and also for the officers working in Central Organisations viz. Ministry of Education, NCERT, UGC and Directorate of Adult Education.
 - (b) Training of Intermediate/Primary level Staff:
 This type of training will be of different nature aiming to give proper exposure to the underlying purpose of data collection, concepts and definitions being used in the process of collection, compilation and techniques of simple analysis of educational data. This training can be organised by the State Education Departments with support from appropriate central organisations. Such type of training would meet the requirements of junior staff like Statistical Assistants,

Investigators, Computers and other clerical staff employed for collection and compilation of statistical data at State headquarter, district level and block level. In addition, the clerical staff employed in university and colleges who are handling the work of statistics also need to be trained by the State Education Departments.

- 6.7 At the central level, for the officers working in the different organisations like Ministry of Education, NCERT and UGC, there is a need for training in the following type of courses:
 - (a) Advance training courses in the use of statistical methods like econometric models, operational research, system analysis, simulation, models in the field of educational planning, etc., and computerisation of educational statistics. Such type of training courses will be relevant for those officers who have got sufficient background in mathematics and statistics.
 - (b) Training courses in the use of simple statistical methods in educational planning and research. Such type of training courses will be relevant to the officers working at the central level who do not have adequate background in the field of mathematics or statistics. Such type of training courses would also be helpful for these Statistical Officers-in-charge of work of collection of educational statistics, in the State Education departments who do not have adequate basic qualifications in statistics.
- 6.8 Regarding the first category of training course, it has been noted by the Committee that there are not many

training institutions in the country where such type of facilities are available at present. To enhance their competence and update their knowledge, the officers working in the statistical unit at the central agencies may be deputed for short-term and long-term training courses in suitable institutions in India or abroad where such type of training facilities are available. Besides, national organisations like C.S.O. and I.S.I. may be also requested to develop the expertise in organising such type of training courses in future.

- 6.9 The staff working in statistical units should be encouraged to attend and participate in meetings and training courses in educational statistics and related subjects. The senior staff in the statistical units should also be given the opportunity to attend/participate in such regional and international conferences and meetings in order to explore them to the latest developments in the different countries in the developments of educational statistics systems.
- 6.10 As far as the other category of officers is concerned, the Committee was of the view that CSO may take the responsibility of organising such type of training courses annually or periodically in collaboration with the Ministry of Education.
- 6.11 At the State level, the statistical staff could be classified into two broad categories, namely, senior staff of the rank of Deputy Director/Assistant Director or Statistical Officer, and the junior staff consisting of Statistical Assistants, Investigators, Computers or clerks doing the statistical work. For the first category of officers, training course of the type of mentioned in para 6.7 may be more useful for the second category, in addition to the training programmes suggested at para 6.6, the Ministry of Education and Culture, NCERT and Directorate of Adult Education

tion should also continue to organise such type of training orientation courses as mentioned under para 6.3 and 6.4 above. Besides, UGC should also initiate action in this matter and organise regional inservice training courses in order to improve the quality and reliability of data relating to higher education.

- 6.12 At the district level, the collection and compilation of educational statistics is limited to primary, middle and secondary/higher secondary schools and, therefore, statistical staff at this level should be trained regularly on annual basis by the statistical unit of the State Education Department as indicated in para 6.2.
- 6.13 At the block level of all the Block Education Officers and the Project Officers of the Adult Education should be trained on regular basis about the various concepts and difinitions used in the educational statistics at the block level. Such type of training courses should be organised by the State Education Department and the State Resource Centre for Adult Education respectively on a regular basis.
- 6.14 The universities and colleges supply a large amount of data to the Ministry of Education and UGC but there is no check on the quality and reliability of data received from them due to inadequate arrangements of training in this respect. There is a need for training in regard to the various definitions and terminologies used for compilation of data in the field of higher education as well as techniques of conducting sample surveys and theme-oriented studies and the maintenance of proper record. Such type of training courses should be the responsibility of the UGC. But keeping in view the large number of colleges, the role of UGC may be limited to only universities where as the statistical units located in

the universities in turn may organise training programme for persons dealing with educational statistics in college. This could be possible as most of the universities are having a planning and statistical cell.

6.15 In training programmes for educational planners and administrators, there should be provision for component for orienting officers in concepts and methodology of educational statistics and their use in planning and administration.

6.16 For the statistical staff in Planning, Monitoring and Statistics Division of the Ministry, NCERT, UGC and other Institutions suitable opportunities should be provided for enhancement of their educational qualifications. They should be encouraged to do Doctorate or other Post-Graduate work on such topics which require the use or development of quantitative techniques in education. Where possible, they should make use of the mass of educational data collected annually or through quinquinnial and other educational surveys for their research.



CHAPTER VII

COMPUTERISATION AND DISSEMINATION OF INFORMATION

- 7.1. In the existing pattern of compilation and tabulation of educational data, the computers are being made use of to a very limited extent. Facilities of a computer terminal are available to the Education Ministry, the NCERT and UGC which are linked to the National Informatic Centre.
- 7.2. From the past trend it has been observed that under the series 'Education in India' publication, the work of compilation and tabulation does not exceed 3-4 months whereas the process of collection and reconciliation itself takes more than 3-4 years. This is due to the fact that the overall work load involved in the process of compilation and tabulation of data is limited to only 31 units consisting of 22 States and 9 Union territories which is quite small to handle the same on computer. Therefore, the time-lag is not likely to improve merely by use of computer for compilation and tabulation purposes at the national level. Recently the Ministry has taken up computerised processing of data on selected items on "Indian students going Abroad." It was possible to introduce computerisation as records in respect of approximately 2000 students/ trainees going abroad every year are available to the Ministry directly from the Reserve Bank of India and could be processed easily on the computer. The computerisation of other items it still under consideration. The

NCERT have been using the computer facilities for data analysis for a long time. The UGC is also expected to introduce computerisation of educational statistics relating to higher education shortly.

- 7.3. Taking note of the available computer facilities and the data being collected by these agencies, the Committee identified the following areas for computerisation in the field of educational statistics:
 - (i) Compilation and tabulation of educational data in respect of higher education.

As the UGC collects data directly from the universities and a large number of affiliated colleges numbering about 4800, it could be possible to compile, tabulate and analyse the data received from colleges and universities on computer.

(ii) Data Bank

At present most of the users of educational data in the country find themselves handicapped in the absence of adequate time series data available in the field of educa-The Committee feels that important educational tion. data collected annually could be stored on magnetic tapes/discs so as to provide ready access to those engaged on research studies. In fact, a large volume of data in the original form is not tabulated at present due to the long time taken in processing the same. Computerisation and storage of the information in the Data Bank will facilitate better utilisation of the data collected. It will also cut down the storage space and time taken in retrieval of educational data and thus will help the planners, administrators and research workers. NCERT and NIEPA should

also build up data bank and conduct other studies based on analysis of educational data. However, their work should be well-coordinated with that of the Ministry of Education and the UGC to ensure that there is no unnecessary duplication.

(iii) Application of statistical techniques to educational data and processing of data of sample surveys.

It could be possible to use computers with advantage for analysing a large amount of data collected and published by the Ministry, NCERT and the UGC and other organisations using statistical techniques like regression analysis, curve fitting, econometrics methods, operational research, simulation, modelling, etc. For conducting large sample surveys in education where the manual tabulation becomes difficult, the use of computers could be most effective. The tabulation of the data collected through sample surveys could be undertaken with speed and accuracy and the results of the surveys made available for use with minimum time lag.

(iv) Projection, forecasting and model building.

The Committee feels that with the use of computers the statistical wing of the Ministry and the other agencies could undertake the work relating to projection and forecasting of different variables which are required by the planners for fixing up the five year plan and annual plan targets. Besides, various policy measures and incentives schemes of the Government could be easily evaluated using simulation models. This could be possible only if computers are used to process the data collected on a large number of institutions.

- (v) Monitoring and evaluation of programme like
- (a) non-formal education programme, (b) adult education programme and (c) technical education programme, etc.
- 7.4 To take up these activities, it would be necessary that suitable computer personnel are available in these organisations. The Committee, therefore, recommends that System Analyst/Programmers should also be provided in the Education Ministry, NCERT and UGC for undertaking computerisation work if not provided so far.
- 7.5 Keeping in view the magnitude of data and the long time taken for their processing, the Committee feels that the pre-coded forms should be used for analysing the useful education data for monitoring and evaluation of these programmes.

Computerisation of educational statistics at the State Level.

7.6. With the introduction of computerisation, it could be possible to centralise the collection of educational data in respect of higher education institutions and higher Secondary schools also. For primary and middle schools also the data could be processed directly with the help of block-wise statistical returns in case of bigger states like U.P., M.P. & Bihar. For this purpose it is desirable to use the pre-coded types of forms for the collection of educational statistics in the States. Due to large number of teachers employed in the schools and colleges, it is desirable to computerise their records at the State level. The storage of data would facilitate to bring out special studies on teachers being taken up including attrition rates of teachers.

7.7. Since it may be difficult to introduce computerisation in the field of educational statistics by all the States, the Committee recommends that a pilot project for computerisation of educational data may be undertaken by the Ministry of Education on experimental basis in case of one of the bigger states like U.P. or Bihar and based on their experience other States may also adopt similar system.

DISSEMINATION OF STATISTICAL INFORMATION Existing Publications

7.8. The Ministry of Education brings out a number of statistical publications on the basis of the information collected from the States/U.T.s and other institutions every year as well as on periodical and ad-hoc basis. The most important statistical publication of the Education Ministry is the annual series "Education in India" Volumes I, II and III which contains detailed data institutions, enrolment, teachers, income, expenditure and examination results. In addition to the publication "Education in India," the Ministry of Education also out a number of other statistical and non-statistical publications to meet its own requirements as well as those of other user organisations. Important time series data is released under the publication "A Handbook of Educational and Allied Statistics", "Trends of Enrolment & Trends of Educational Expenditure in Centre and States." The complete list of all the statistical publications brought out by the Ministry of Education is given in Annexure VIII.

Printing

7.9. The Committee noted that the printing of statistical publications takes one year or more as the job is to be done by the Government of India Presses. Due to this avoidable delay the various user organisations are not

able to use the latest data which could have been otherwise made available to them, in case the statistical publications could have been timely printed on priority basis by the Government of India Press or alternatively, through private printing press. The Committee, therefore, recommends that the Ministry should ensure that the Directorate of Printing makes available the printed copies of all the statistical publications within a period of 3 to 4 months after receiving the manuscript, in case, undue delay in printing is anticipated on any occasion, the Ministry should take immediate action so that the publication could be printed with the help of the private printing presses in the stipulated time of 3 to 4 months.

- 7.10. For many publications the print order is generally one thousand or less. It is therefore, suggested that the Ministry of Education may consider procuring necessary equipment for reproduction of thousand copies or so, so that printing work is done expeditiously.
- 7.11. Another bottleneck in the timely printing of statistical publication is the longtime taken in the collection and reconciliation of data relating to the Higher Education. To avoid this, the Committee recommends that the Ministry of Education should bring out separate statistical publications on school education and higher education so that timely data is available to different user organisations at least for school education.

CHAPTER VIII GENERAL

Administrative Legislative Measures

8.1 The general response to statistical questionnaires from educational institutions especially the private institutions is not at all satisfactory. To improve the rate of response from the recognised private institutions, Committee is of the view that certain administrating and legal sanctions will be necessary. The grants-in-aid code should make it obligatory for the aided institutions to supply the data. In respect of the unaided institutions, the affiliating bodies to which they are affiliated should introduce suitable condition in this regard. In the case of persistant defaulters, recourse to these provisions may be made. For the unrecognised institutions, however, problem is not simple. These institutions function on commercial basis and there is generally no system of registration of these institutions. The Committee felt that these could be possibly brought within the scope of "the collection of Statistics Act, 1953" which facilitates the collection of statistics from commercial concerns, provided there is a system of registration. It is, however, noted that the different types of un-recognised institutions may not lend themselves to a common system of registration. However, in view of the increasing number of un-recognised schools at the school stages of education, the committee consider it desirable to introduce a system of compulsory registration and submission of statistics for which necessary action may be initiated early.

Review of System of Collection

8.2 It is also necessary to discuss critically and review the problems in the collection of educational statistics and to consider changes in the system to meet the emerging needs. It is suggested that a conference of users and producers of educational data should be organised by the Ministry of Education once in 5 years. In addition, a special Committee may be setup to review the entire educational statistics system once in 10 years.

Improvement of Educational Statistical Methodology and Approach

8.3 More of seminars, conferences and workshops should be organised at the national level, for the review of the educational statistical methods and approach to problems, dissemination of information about new techniques methodology and innovation, development of new statistics etc. It is suggested that Ministry of Education, NCERT may organise in collaboration with appropriate agencies, seminars/workshops on suitable subjects periodically to update the personnel on the development in the field of educational statistics in the country and abroad.

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CHAPTER IX

SUMMARY

9.1 The review of the educational statistics system covered in the preceding chapters has been undertaken in fulfilment of a long-felt need which found expression in the resolution proposed by Prof. P. K. Bose, formerly Pro-Vice-Chancellor of Academic Affairs, Calcutta University, in the Eighth All India Conference on Educational Statistics, 1980. The aforesaid resolution took note of the certain deficiencies of the existing system such as excessive time lag, inaccuracies of data and non-coverage of items relating to requirements of planners and administrators, and also of the efforts hitherto which tended to tackle the problem on a piecemeal basis. It has, therefore, been urged that a comprehensive review be made and a perspective plan programme for the development of the information system in the sector of education may be evolved.

9.2 In the follow up, the Government of India assigned this task to this Committee. Keeping in view its terms of reference, the Committee has devoted considerable attention to the problems as obtained in the system of educational statistics at present, the weaknesses in the organisation and management set up and in the procedure for data collection. In the chapter on "System of Educational Statistics", a critical review is made on the existing system particularly on the need for coordination amongst the agencies engaged on similar tasks, and interaction with user organisations. The chapter on "Educational Statistics for Planning and Management" dwells at length on the major data gaps from the point of view of

planners and administrators. The Committee could well appreciate the inherent problems of data collection of some of these items and have, therefore, recommended different types of programmes to meet the requirements. The main emphasis in the chapter on "Organisation and Management" is on the need for maintenance of proper data at each level, vertical flow of information as necessary, and above all the need for coordination of efforts. The recommendations, therefore, include certain streamlining of the machinery and also the strengthening of the machinery at all levels. The data collection procedure has been fully analysed in the relevant chapter. Different types of data collection programmes *i.e.* census, survey, etc. have been spelt out for the several activities recommended.

- 9.3. A review of the statistical system is not complete without deliberations on the publication activity and dissemination of information. The chapter on "Computerisation and Dissemination of Information" covers these important aspects at the post-data collection stage, including storage and retrieval. Considering that personnel of different backgrounds and experience contribute to the data collection process at the ground level and thereafter, the Committee is of the view that training of personnel is of considerable significance. A separate chapter on training stands included in the Report.
- 9.4. The recommendations made in the different chapters have been listed in the next chapter. Some of the important features, relate to:
 - (a) Introduction of Management Information System. Information system as an important tool on management is yet to gain recognition. It is

desirable and necessary to introduce the system gradually for which purpose suitable guidelines have been included in the Report. When introduced, the system would serve in multipurpose needs for decentralised planning, administrative requirements, monetary and evaluation.

- (b) Strengthening of the Statistical Machinery at the Central level, State level as well as district and block levels. The excessive time-lag in the data collection and the lack of reliable data obtained in the present system cannot be overcome without providing for the appropriate machinery at the field levels. The State Governments need to look this aspect and initiate for adequate steps for strengthening the Staff.
- (c) Coverage of Non-formal Education Sector in Educational Statistics: With the spread of non-formal education at the school stage and similar programmes for the adults and with the increasing facilities provided for continuing education through non-formal programmes, this sector of education can no more be excluded in the compilation of educational statistics.
- (d) Conduct of All India Educational Survey Every Five Years: The All India Surveys conducted by the NCERT provide a wealth of information useful for planning purposes, organising the work a couple of years before every Plan would be extremely useful from the point of view of educational planning in the Five Year Plans.
- (e) Recourse to sample surveys to supplement census data: This is necessary for collection of such education variables which cannot be cover-

- ed by the census collection. Moreover, the data collected on census basis is not all that dependable as has been the experience. Sample checking of data collected in 5—10% of the institutions is to be necessarily introduced, to improve the reliability of data.
- (f) Constitution of a State Standing Committee to review periodically the progress of data collection: Time lag in data collection is a major problem which cannot be reduced without inbuilt provisions in the system itself for a regular periodic monitoring of the progress of data collections at the senior levels. Remedial measures are, therefore, necessary both at the State Government level and at the Centre.
- (g) Collection of additional data for such items as wastage in education, attrition of teachers etc., to meet the educational planner's requirements.
- work: The training of the personnel is necessary for improving the quality and reliability of the data collected and compiled. Keeping in view the diverse background and experience of the cross-section of personnel engaged on this work, the programmes need to be specially drawn out to the different groups.
- (i) Computerisation of educational facilities: Increasing use should be made of computer facilities for data processing, computer data banks should be built up at the national level.
- (j) Provision for registration of unrecognised schools: According to the recent trends, the7 Edu —6

number of un-recognised schools coming up in the different parts of the country contributes to a significant proportion of enrolment. To facilitate the data collection in regard to such enrolment, there is need for the introduction of system of registration in respect of unrecognised schools.

It $i_{\rm S}$ hoped that these recommendations find acceptance and are acted upon expeditiously.



CHAPTER X

CONCLUSION AND RECOMMENDATIONS

10.1 In the preceding chapters several recommendations have been made by the Committee for implementation. To facilitate several departments/agencies concerned to draw up a perspective plan of action programme, it has been considered necessary to group the more important recommendations into two separate categories (a) those recommendations that require immediate follow up action and (b) those which are of long term nature. Other recommendations made in the relevant chapters are none the less important in the overall context of improvement of Educational Statistical System and it is hoped that concerned departments would take up these for implementation in normal course.

Accordingly, the list of recommendations are classified below:—

Category (a): Recommendations for immediate follow-up action.

Measures to reduce Time-lag

10.2. There has been some improvement in the reduction of time-lag in the collection of educational statistics. However, there is need for further reducing the time-lag without sacrificing information. The Committee recommends that the Ministry may bring out an annual review

of the progress of collection and dissemination of statistics Statewise which may be discussed at the Annual Conference of the Education Ministers.

(Para 2.22)

Modification in the Format

10.3 Instead of the existing series of ES forms being used currently for collecting data on schools and colleges, two separate sets of forms be used, one for schools and another for higher educational institutions.

The collection of data in respect of the items under the existing system may continue subject to certain changes as indicated in Annexure-VII.

(Para 3.4)

10.4 The data on income and expenditure on schools should continue to be collected annually except for private schools, the financial data should be collected directly from the concerned educational authorities, who prepare the budget and maintain the record of accounts.

(Paras 3.6 & 5.13)

Sample checking for quality of data collected

10.5 The Committee recommends sample studies being undertaken to test the quality and reliability of educational data collected by the States. Such studies should be taken up both by the State and Central agencies engaged in statistical activities.

(Para 2.34)

10.6 There should be a system for checking 5 to 10 per cent school returns on a regular basis in order to

ensure that the schools supply correct information. Further, the system of sample checking should be introduced at all stages of data collection and compilation, and particularly for the data collected from educational institutions at school level.

(Para 5.19)

Agencies for Data Collection

10.7 The Ministry of Education should be the main agency for the compilation and dissemination of educational data. The Ministry of Education apart from collecting data in respect of schools, may also collect data in respect of non-affiliated institutions and also about the school/classes attached to the institutions of higher education

(Paras 2.13 & 5.22)

10.8 The next All India Educational Survey may be taken up in 1983 and planning for this should start immediately. The data so collected should be available within a year thereafter so that the data can be helpful for the preparation of the Seventh Five Year Plan. It would also be desirable to have the educational survey data in future made available well in time for the formulation of the Five Year Plans. It is also necessary to have periodical commprehensive educational surveys in regard to higher and professional education by appropriate agencies and the survey data should be available for the formulation of Five Year Plans well in time.

(Para 2.25)

Additional Data-Wastage

10.9 Considering the dimensions of the problem, studies on wastage and stagnation should be taken up in

depth, preferably district-wise, separately for Scheduled Castes and girls.

(Para 3.10)

Review & Monitoring of Data Collection

10.10 For ensuring timely collection, compilation and publication of educational statistics, periodic review and monitoring of collections/ dissemination of educational statistics be undertaken at the highest level with State Education Secretary as its Chairman. The Committees may review periodically the progress in regard to transmission to the Government of India of educational statistics in the States.

(Para 4.22)

Interaction with User Agencies

10.11 To establish this link with other agencies involved and to provide a regular interaction of the user organisations, the Committee recommends the need for larger participation of these organisations, in the Standing Committees on Educational Statistics at the Central & State level. (Paras 3.22 & 4.7)

Schemes for strengthening Educational Statistical Machinery

10.12 The State should prepare proposals for strengthening and expansion of the statistical and monitoring units of the Department of Education and the proposals should be included in the State Plan proposals.

(Para 4.6)

Category (b): Long-Term Recommendations

Concepts & Definitions

10.13 Various concepts and definitions used in educational statistics should be further standardised wherever

mecessary and adopted uniformly by various agencies concerned with educational statistics at the national and State levels. It would be desirable to incorporate these concepts in the syllabus for teachers training courses. It would also be necessary to bring out a hand book explaining the concepts and definitions in educational statistics for the use of educational administrators.

(Para 2.29)

Additional Data Collection recommended

10.14 For making enrolment projections and for assessing the enrolment ratio at the elementary stage, it is necessary to collect data on age of students by sex and grade. Such data by single year of age should be collected once in five years at least on a sample basis for grades I to X.

(Para 3.5)

10.15 Data on the results of public examinations below the secondary levels should be collected on periodical basis from the concerned examining bodies and compiled at the State level. For the examination results of the secondary, higher secondary and university examinations, the relevant data should continue to be collected from the concerned examining bodies and compiled at national level. The data should show results by sex, Scheduled Castes & Scheduled Tribes, private/regular candidates and passing division (where possible) for different examinations.

(Para 3.7)

Rationalisation of data collection at the Centre

10.16 The work relating to the collection of educational statistics in respect of universities and affiliated colleges

may be done by the UGC. The UGC may furnish the relevant statistics to the Ministry of Education, Government of India and the State Governments in a suitable manner. The State Governments may in addition collect and compile such data as they need from the colleges and universities directly. Till the new system of collection of statistics by the UGC becomes fully operational, the Ministry of Education may continue to collect data in regard to institutions of higher education (say for a period of 2 years) for maintaining continuity of the statistical series.

(Paras 2.27, 5.22 & 5.23)

10.17 A comprehensive All India Educational Survey should be conducted once in five years and NCERT should be responsible for planning and conducting such a survey. The survey should aim at providing benchmark data at the district/block level for the use of the State Governments for educational planning. The collection of data in regard to items included in the present form ES. VI of the Ministry of Education may also be covered in this survey. It is desirable that the reference data and the concepts and definitions of the terms used in the survey are such as to maintain continuity with the annual statistics collected and compiled by the Ministry.

(Paras 2.24 & 2.25)

10.18 The basic data of adult education collected through the Directorate of Adult Education should be incorporated by the Ministry as a part of its annual collection. The DAE may continue their system of the quarterly reports.

(Para 2.28)

Identification of Nodal Agencies at the State level

10.19 The Committee recommends assigning the responsibility for furnishing statistical data to the Ministry

and other agencies, to one unit namely, the Statistical Unit in the State Education Department. For such other material not available in the process of normal collection by the State Educational Statistical Unit, the Department Unit concerned may be required to consult this Unit before taking up collection on their own.

(Para 2.17)

10.20 In order to avoid duplication of data collection in respect of Technical Education by the State Governments, the Committee recommends that main responsibility of collecting data from technical institutions should be that of State Technical Education Departments.

(Para 5.27)

Data Collection relating to Non-formal Sector of Education

10.21 Relevant educational data should be collected in respect of the recognised institutions in regard to both formal and non-formal courses of education by the Ministry of Education or other Departments and Organisations as identified in this regard.

(Para 2.35 (a))

Data Gap-Attrition Rate of Teachers

10.22 The data on attrition rate of teachers should be collected by NCERT once in 5 years in their All India Survey.

(Paras 3.11 & 3.12)

Data Gap-School Attendance

10.23 It is recommended that collection of data on school attendance should be done on a sample basis.

(Para 3.14)

Management Information System

10.24 Suitable Management Information System for education should be developed by each State to meet the requirement of decentralised planning & administration, following the guidelines given in Annexure (VI).

(Para 3.21)

School Registers

10.25. All the schools should maintain at least four types of registers, (1) Admission Register, in which information about students date of birth, sex, religion, mother tongue, parents' occupation and address; or S. T., date of admission, distance from home, record of previous schooling, etc., is maintained; and also information about those who leave the school is recorded, (2) School Information Register, in which information for facilities and equipment (building, covered area, furniture and other equipment), participation of students extra curricular activities, games and sports, etc., is recorded, and (3) Attendance Register, which is separate for each class and contains information on sex and date of birth of the student, whether the student is a new entrant, repeater or promotee, and of course, day-to-day dance in the school, and (4) Teachers Register, contains full data on age, qualification, residence, salary, etc. of the income from different sources and expenditure incurred on different items each year.

(Para 5.9)

Statistics to be maintained at various level

10.25 District-wise and block-wise basic educational statistics should be maintained in appropriate form at

State/District level facilitating easy retrieval of information.

(Para 5.12)

Sample Survey

10 27 Sample sureys should be used more frequently for collecting data on the items which are required for specific purposes and on which it is very expensive and time consuming to collect data on a census basis. For undertaking these surveys, there should be proper infrastructure.

(Paras 5.15 & 5.18)

Strengthening of the Machinery at the Centre

10.28 "The present Statistical Unit needs to be entrusted with the task of planning, research, evaluation and monitoring pertaining to maintenence of all-India Educational Statistics and for this purpose it should be suitably strengthened. It should be headed by a competent and experienced professional statistician, who should serve as Statistical Adviser to the Ministry of Education. This is also in accordance with the recommendation of the Committee to Review the National Statistical System in India (Recommendation No. 10.1 of the Report published in June 1980.)

नदापेव नयने (Para 4.10)

Strengthening of Statistical Machinery in States

10.29 The Planning, Statistics and Monitoring Unit in States should be under the overall charge of a Senior Officer, preferably not below the rank of Deputy Director.

(Para 4.16'a')

Computerisation of Data

10.30 To take up computerisation, it would be necessary that suitable computer personnel are available in Ministry

of Education, NCERT and UGC. It is, therefore, recommended that posts of System Analyst/Programmers etc., may be created in these organisations.

(Para 7.4),

Printing and distribution of Forms

10.31 The Committee recommends that all types of Forms should be got printed and distributed, preferably at the State level but, if necessary at District level.

(Para 4.18)

Data Bank

10.32 It is essential that a data bank at the national level is set up in the Ministry.

Similarly there is the need for maintaining at the field levels a mini 'Data Bank' to meet demand for policy, planning and administration at these levels.

(Para 7.3'ii')

Training

10.33 To enhance their competence and up-date their knowledge, the officers working in the Statistical Unit at the Central Agencies may be deputed for short term and long term training courses in institutions. Besides, national organisations like CSO and ISI may also be requested to develop the expertise in organising such type of training courses in future.

(Para 6.8)

10.34 Training courses may be organised by the State Education Departments at district level for the benefit of statistical personnel working at district level annually on regular basis. The Central agencies should depute their personnel as resource persons for such courses.

(Para 6.12)

10.35 All the Block Education Officers and the Project Officers (Adult Education) should be trained on regular basis about the various concepts and definitions used in the educational statistics at the block level. Such type of training courses should be organised by the State Education Department and the State Resource Centre for Adult Education respectively on annual basis.

(Para 6.13)

10.36 In the training programmes for educational, planmers and administrators, there should be provision for a component for orienting officers in concepts and methodology of educational statistics and their use in planning and administration.

(Para 6.3)

10.37 For the statistical staff in Planning, Monitoring & Statistics Division of the Ministry, NCERT, UGC and other Institutions suitable opportunities should be provided for enhancement of their educational qualifications. They should be encouraged to do Doctorate or other Post-Graduate work on such topics which require the use or development of quantitative technique in Education. Where possible, they should make use of the mass of educational data collected annually or through quinquinnial and other educational surveys for their research.

नवामे नयने (Para 6.15)

Computerisation and Dissemination of Information, Storage and Retrieval of Data

10.38 The Committee recommends increasing use of computerisation of educational data both at the Central and State level to the extent possible, which will help in storage and retrieval.

(Para 2.37)

Separate Publications for School and Higher Education

10.39 The Ministry should bring out separate statistical publications on school education and higher education so that timely data is available.

(Para 3.4)

General & Legislative measures

10.40 In order to improve the rate of response to statistical questionnaires from recognised private educational institutions, the Committee considers that administrative and legal sanctions are necessary. In the case of persistent defaulters, recourse to the penal provision may be explored. However in view of the increasing number of unrecognised schools it is desirable to introduce a system of compulsory registration.

(Paras 2.35 & 8.1)

Review of system of collection

10.41 A Conference of users and producers of educational data be organised once in 5 years for reviewing the problems regarding data collection and for suggesting improvement.

(Para 8.2)

Improvement of Statistical methodology technique

10.42 More seminars, conferences and workshops should be organised at the national level for the review and discussion of educational statistical methods and approach and dissemination of information about new techniques, methodology and innovations and development of new strategies, procedures and plans of improvement of educational statistics.

(Para 8.3)

ANNEXURE I

(TO BE PUBLISHED IN THE GAZETTE OF INDIA PART I SECTION I)

GOVERNMENT OF INDIA

MINISTRY OF EDUCATION AND CULTURE

(DEPARTMENT OF EDUCATION)

SHASTRI BHAVAN,
DR. RAJENDRA PRASAD ROAD,
NEW DELHI-110 001.

NEW DELHI, the Dated 20th Feb., 1981. No. F. 10-1|81-STAT. New Delhi

The Government of India hereby constitute the High Level Committee for a review of the entire educational Statistical System in the country with effect from 15th March, 1981 with following members.

Chairman

1. Joint Secretary, Ministry of Education & Culture (Deptt. of Education) Govt. of India, New Delhi.

Members

- Prof. P. K. Bose, Head, Deptt. of Statistics, Calcutta University, Calcutta.
- Shri M. B. Buch (Retd.) Ex-Head, Deptt. of Education, M.S. University of Baroda.
- Director General, Central Statistical Organisation, & Ex-Officio Addl. Secretary, Deptt. of Statistics, New Delhi.

- Adviser (Education), Planning Commission, New Delhi.
- Executive Director, National Institute of Educational, Planning and Administration, New Delhi.
- 7. Prof. & Head, Survey & Data Processing Unit, National Council for Educational Research & Training, New Delhi.
- Secretary, University Grants Commission, New Delhi.
- 9. Vice-Chancellor, Agra University, Agra.
- 10. Director, Bureau of Economics & Statistics, Delhi Administration, Delhi.
- 11. Education Secretary, Government of Jammu & Kashmir.
- Education Secretary, Government of Uttar Pradesh.
- 13. Education Secretary, Government of Kerala.

Member Secretary

Deputy Director, Ministry of Education & Culture, Government of India, New Delhi.

The Committee will submit its interim report within a period of six months suggesting short-term measures to improve the existing system of Educational Statistics whereas final report giving long-term measures as well as other recommendations would be submitted within a period of one year after its constitution.

The term of the references of the Committee will be as under:—

 To prepare a prespective plan for the improvement of the educational statistics and their utilisation in policy making, planning and administration at all levels.

- 2. To propose the methodology for collecting data on various items and to spell out the role of different agencies involved in data collection so that duplication of efforts is avoided and the relevant data are made available with minimum of resources.
- 3. To suggest the type of schedules to be used for data collection from Primary sources and the records to be maintained at different levels so as to help in efficient collection of information.
- 4. To propose measures for improving the quality and timely presentation of data.
- 5. To suggest the changes in the infrastructure at the Central and State levels and the norms for staff, etc., in order to bring about the above improvements.
- 6. To suggest training and orientation programmes at all levels for ensuring proper collection and use of data.
- 7. To suggest short-term measures for improving the existing system on the basis of the discussions held with the high officials by personal visits of members of the Committee to some of the States.

Secretarial Assistance to the Committee will be provided by Planning, Monitoring and Statistics Division of the Ministry of Education and Culture, Department of Education.

Sd/-

(P. S. SAKUNTALA) DEPUTY SECRETARY TO GOVT. OF INDIA.

7 Edu.—7

To

The General Manager, Government of India Press, Fariabad. (with Hindi version)

No. F. 10-1/81-Stat.

New Delhi, Dated 20th February, 1981

Ccpy forwarded to:-

- 1. All Ministries/Departments of Government of India.
- 2. Chief Secretaries to all State Governments and Territory Governments/Administrations.
- Education Secretaries to all State Governments and Union Territory Governments/Administrations.
- 4. Director of Public Instructions/Education of All State Governments and Union Territory Governments Administrations.
- 5. Director of all State Statistical Bureaus.
- 6. E.I./E.II and E.III Sections.
- 7. Works Study Unit/Co-ordination Section/Parliament Units
- 8. P.S. to ES/MS/EM.
- 9. Members of High Level Committee.

Sd/-

(P. S. SAKUNTALA)
DEPUTY SECRETARY, GOVERNMENT OF INDIA

ANNEXURE II

TERMS AND REFERENCE AND THE COMPOSITION OF THE PROPOSED WORKING GROUPS A AND B.

Working group A

- (i) Identification of areas on which data should be collected to be decided in consultation with user organisations such as Planning Commission, UGC, IAMR, DST, NIEPA, NCERT, States, and some of the divisions of the Ministry.
- (ii) To review the existing schedules in respect of Primary, Secondary and Post Secondary levels (including General and Professional Education).
- (iii) To review the schedules for the collection of statistics for National Adult Education Programme, Non-formal Education and Technical Education.
- (iv) Advice in regard to which statistics will have to be collected and to evolve suitable schedules for the same.
- (v) To standardise the concepts and definitions being used by the Ministry in relation to the UNESCO's ISCED Classification.
- (vi) Any other matter relating to either of the objectives mentioned above.

COMPOSITION

Chairman

(1) Dr. K. C. Seal, Director General, CSO,

Members

- 2. Dr. M. B. Buch, Baroda.
- 3. Shri M. C. Dubey, Dy. Adviser (Planning Commission).
- 4. Shri S. Vishwanath, Jt. Secretary, U.G.C.
- 5. Shri A. K. Dasgupta, Adviser, Institute of Applied and Man Power Research.
- 6. Shri Atma Prakash, Additional Director, Deptt. of Education, U.P.
- 7. Shri K. R. Sharma, Asstt. Director Planning and Stat. (Department of Education), Government of Jammu & Kashmir.
- 8. Shri R. K. Bhandari, Dy. Director, Ministry of Education & Culture.

Convener

9. Shri G. C. Kwatra, Research Officer, Ministry of Education & Culture.

WORKING GROUP B

- (i) Identification of areas on which data should be collected to be decided in consultation with the user organisations such as Planning Commission, UGC, IAMR, DST, NIEPA, NCERT, States and some of the divisions of the Ministry.
- (ii) Review of the organisational structure of Planning, Monitoring and Statistical Divisions at Centre and States and to suggest necessary changes for the same.
- (iii) Role of different agencies in data collection.
- (iv) Training requirement of the staff at Central State and lower levels.

- (v) Procedures of data collection (1) Complete enumeration (2) Sample Survey (3) Ad-hoc Studies—Inspection, etc.
- (vi) Processing, printing and publication of educational data.
- (vii) Storage and retrieval, dissemination of education data.
- (viii) Introduction of legislative measures for timely collection of education data.

*COMPOSITION:

Chairman

1. Prof. P. K. Bose, Calcutta

Members

- 2. Shri J. Veeraraghavan, Executive Director, NIEPA.
- 3. Dr. T. N. Dhar, Jt. Director, NCERT
- 4. Dr. A. B. L. Srivastava, NCERT
- 5. Shri R. S. Mathur, Dy. Director, Directorate of Adult Education.
- 6. Shri V. R. Kanade, Senior Research Officer, Directorate of Education, Government of Maharashtra.
- Shri K. V. Ranga Reddy, Dy. Director, DPI office, Govt. of Andhra Pradesh.
- Prof. T. V. Rao, Indian Institute of Management, Ahmedabad.

CONVENER

Shri S. C. Seddey, Dy. Director (Stat.) Ministry of Education and Culture.

ANNEXURE III

PROGRAMME VISITS OF THE HIGH LEVEL. COMMITTEE TO DIFFERENT STATES FOR STUDYING THE PLANNING, MONITORING AND STATISTICAL SYSTEM

| States Visited | Date on which the | ie | Composition of the team which visited State. |
|--------------------|-------------------------|------------|----------------------------------------------|
| Karnataka | 16-17 November, | i) | Sh. S. Ramamoorthi |
| | 1981 | ii) | Dr. M. B. Buch |
| | | iii) | Sh. J. Veeraraghayan. |
| | | iv) | S'v. A. K. Dasgupta |
| | | v) | Sh. G. C. Kwatro |
| West Bengal | 15-16 February, | i) | Miss P. S. Sakuntala |
| | 1982 | ii) | Prof. P. K. Bose. |
| | 6 March, 1982 | iii) | Dr. A. B. L. Srivastava |
| | | iv) | Sh. S.C. Seddey |
| Jammu & Kashmir | 26-27 February, 1982 | 'i) ii) | Sh. S. Ramamoorthi Prof. P.K. Bose |
| | | iii) | Dr. A. B L. Srivastava |
| | TEST NO. | iv) | Sh. R. S. Mathur |
| | सद्यमंत्र न | v) | Sh. S. C. Seddey |
| Uttar Pradesh | 26-27 March, | i) | Sh. S. Ramamoorthi |
| | 1982 | ii) | Dr. K.C. Seal |
| | | iii) | Prof. P. K. Bose |
| | | iv) | Dr. A. B. L Srivastava |
| | | v) | Sh. S. C. Seddey |

ANNEXURE IV

QUESTIONNAIRE FOR FILLING UP BY USER ORGANISATION

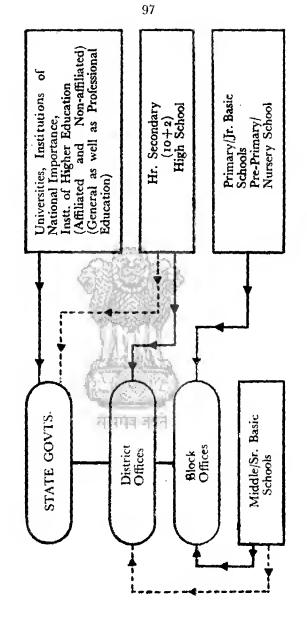
- Do you use the educational statistics collected and published by
 - (i) Ministry of Education
 - (ii) U.G.C.
 - (iii) NCERT
 - (iv) Any other Agency, specify.
- 2. If so, mention the list of publications (with agencies).
- 3. Do you find these publications are useful for you for planning, monitoring and evaluation or for any other purpose.
- 4. (a) If yes, mention the specific uses you have made of them during the last 3 years.
 - (b) If not, do you find the available information to be inadequate, insufficient, unreliable or outdated (more time lag):
- 5. (a) Have you experienced any difficulty in getting the information which you need for your work during the last 3 years. If so, identify these areas i.e., item of information on which data are not available but which of these you consider to be important and on which the Ministr should collect the required information should be mentioned.

- 6. What are the other major datagaps in educational statistics from the point of view of your Organisation.
- 7. Any other remarks which you will like to make in regard to the availability of educational statistics in the needs of your Organisation.



ANNEXURE V

SYSTEM OF COLLECTION OF EDUCATIONAL STATISTICS IN STATES



Dotted line indicate that in some of small States data flow directly.

ANNEXURE VI

MANAGEMENT INFORMATION SYSTEM—A SUGGESTED MODEL

A model for management information system as envisaged in Para 3.21 of the Report is given below. Needless to say the system will have to be modified according to the requirement of each State and in particular will have to be in accordance with the basic administrative system in education.

2. The System

In the proposed system it has been anticipated that the system of decentralised planning will be adopted upto district level in all the States/UTs. For proper functioning of this system, there is also a need for effective monitoring and to provide sound data base, there should be a well organised system of management information. In the proposed new system it is expected that planning, statistics, monitoring and evaluation will be coordinated activities at all levels and the data base for all these activities would be provided by the management information system which should have the following main features:

- (i) It should be a unified system and only one agency should undertake the responsibility of collecting basic information. The basic reporters should be required to submit information on standard and simple forms to one agency alone. Duplication or overlapping should be scrupulously avoided at this stage.
- (ii) Sufficient information to meet the identified needs of the various agencies within and outside

the department of education at the several levels of administration for effective planning, implementation, monitoring, evaluation and management should be collected from the basic source. As collection of any additional information already available would be a very costly and a time consuming process, there should be a central agency to take decision on the collection of any additional information, its scope, coverage, frequency and the use it would serve.

(iii) At the block, taluk and district levels, a 'Data Bank' should be maintained to meet the day to day demands for policy, planning and administration from various levels. The information in these data banks should be kept on the basis of 'Individual Data System', i.e., comprehensive information on each school, teacher and habitation.

Types of Forms

The proposed system may have the following forms:

- (a) Basic Collection Forms
 - (i) Monthly Enrolment Statement
 - (ii) Quarterly Staff Statement
 - (iii) Quarterly Plan Progress Statement
 - (iv) Bi-annual Income and Expenditure Statement
- (b) Registers for Data Bank
 - (i) Village Informatoin Register
 - (ii) School Information Register
 - (iii) Income and Expenditure Register
 - (iv) Plan Progress Register
 - (c) Tabulation Forms
 - (i) Monthly/Quarterly Selected Educational Statistics

- (ii) Quarterly Plan Progress Report
- (iii) Annual Statistical Return

Sample Checking

Sample checking of information supplied by the basic reporters should be done by the field supervisory agency as part of their normal duties. Five per cent of the institutions should, however, be selected on random basis for such a sample check. The Staff officer of planning at the block/Tehsil and district levels should undertake at the checks in their areas. Checking without any follow-up will not bring any desirable results. Suitable action should be taken against the heads of institutions who do not properly maintain or supply the statistical records. At the same time there should be regular checking of records maintained by the staff officers of planning and statistics at various levels. This responsibility should be assigned to the administrative agency which should inspect their records at least once a year.

There is also need for feedback to the supplies of information. For success of the above information system, it is essential that the information finalised at the district level is got printed for distribution to the lower level units who have contributed directly or indirectly by collecting, compiling and submitting the information. This would result in a higher degree of correctness and minimal time-lag in the flow of information.

3. Requirement of Staff

For effective establishment and functioning of the system as proposed above for educational planning, statistics, monitoring and evaluation at various levels, adequate and trained staff is required at those levels, if need be, even at the Block level.

The strength of the staff may vary according to the workload. The following quidelines can be followed in this regard:

- (i) State Level
- (a) The planning, statistics and monitoring units should be under the overall incharge of a senior officer; preferably not below the rank of a Dy. Director. If require, one or two Asstt. Directors can also be provided to assist him to look after the following work:—
 - Planning and monitoring and
 - Statistics and survey
- (b) If there is only one Directorate of Education, the above units should be located there, otherwise, efforts should be made to locate this unit in the secretariat or Commissioner's office. However, in such cases, a small unit with one Asstt. Director should be provided in all the Directorates of Education. The main unit will coordinate their functioning.
- (c) The ministerial support to these units should be provided on certain norms which can be prescribed for creation of such posts according to the workload.

(ii) District Level

A staff officer of suitable rank should be provided in the office of the District Education Officer. This staff officer should be responsible for evaluation and monitoring of plans and preparation of regular statistical reports. According to the needs of the district this staff officer can be given additional staff assistance.

(iii) Block/Tehsil Level

At block/tehsil or taluk level, the Education Officer at this level should himself look after the work of planning, monitoring, statistics and survey of the area, under his/her jurisdiction. He may be assisted by Statistical Assistants or teachers specifically trained for the purpose, according to need.

4. Summing up

It is emphasised that the essense of MIS is in the use of data/information collected for management policy formulation, planning etc. It is in the actual use that the concepts will get sharpened and made relevant to the needs of the users.



ANNEXURE VII

SIMPLIFICATION/MODIFICATION OF THE EXISTING FORMS OF COLLECTION OF STATISTICS USED BY THE MINISTRY

In all, the Ministry of Education uses six forms, namely ES.I, ES.II, ES.III, ES.IV, ES.V & ES.VI. Out of these forms ES.I to ES.IV are convassed on annual basis whereas Forms ES. V & ES. VI are convassed on quinquennial basis.

Form ES.I.

- (a) There is no need to have separate classification of institutions into two categories namely affiliated and non-affiliated. It should be immediately discontinued. This alone will cut down the size of the form considerably.
- (b) Two separate forms may be used for collection of data from schools and colleges instead of using a composite form ES.I which covers both schools and colleges.
- (c) Information on classwise repeaters for the two sexes should be collected by changing the format of table III-D of the form.

Form ES.II

- (a) It is not necessary to collect detailed data on income and expenditure for all types of institutions.—For primary and middle schools, the information should be collected only in respect of the following items:
 - (i) Teachers salaries,
 - (ii) Other recurrent cost (all put together) &
 - (iii) Capital cost.

(b) There is a need to collect detailed data (as being collected in existing forms) on expenditure in respect of secondary/higher secondary schools and institutions of higher education.

Form ES.V (Districtwise Educational Statistics)

The information relating to higher education may be discontinued keeping in view its limited significance at the district level.

Form ES.VI

This form is to be discontinued in future in pursuance of the recommendations for coverage of these items in the All India Surveys on regular basis once in five years by NCERT, UGC and other agencies, hereafter.



ANNEXURE VIII

LIST OF PUBLICATIONS BROUGHT BY THE PLANNING, MONITORING & STATISTICS DIVISION

| S.No. | Name of the Publication | Periodicity |
|-------|---------------------------------------------------------------------------------------------------------|-------------|
| Ι. | Education in India—Vol. I (Numerical Data) | Annual |
| 2. | Education in India—Vol. II (Financial Data) | Do |
| 3. | Education in India—Vol. III (Examination Results) | Do |
| 4. | Selected Educational Statistics . | Do |
| 5. | Boards of Secondary Education in India, (Results of High School and Higher Secondary Examination) | Do |
| 6. | Pay Scales of School Teachers in India | Do |
| 7 · | Selected Information on School Education in India. | Dэ |
| 8. | Progress of Education of Scheduled Castes/Scheduled Tribes | Dα |
| 9. | Analysis of Budgeted Expenditure on Education. | Do |
| 10. | Analysis of Annual Plan | Do |

| S. N | o. Name of the Publication | Periodicity |
|------|------------------------------------------------------------------------------------------------------------------------|---------------------------------------------|
| 11. | Directory of Institutions For Higher Education in India. | Biennial |
| 12. | A Hand book of Educational and Allied Statistics | Do |
| 13. | Educational Statistics Districtwise Vol. I-XXVI. (Separately for each State/UT having more than one district) | Quinquennial |
| 14. | Indian Students Going Abroad and Foreign Students Studying in Indian Universities and Institutions. | Quinquennial (Time Series Data) |
| I, | Graphic Presentation (on Education) | Decennial (to be made Quinquen- nial) |
| 16. | Trends of Expenditure on Education | Periodical |
| 17. | Development of Enrolment Trends of Scheduled Castes and Scheduled Tribes Enrolment Trends in States | Ad-hoc Periodical |
| 19. | Study of Provision and Utilisation of Schooling Facilities | Ad-hoc |
| 20. | A Study of Administrative Set up in States for Educational Programme of Scheduled Castes and Scheduled Tribes | Ad-hoc |